# NEWSLETTER

N°41 – March 2020

## Contents



## FISUEL General Information

**For consistent newsletters**

Thank you for continuing to enrich the newsletters with your articles.
As them, if you have topics that you would like to share with the recipients of the FISUEL newsletter, send us a page with photos to the e-mail address patrick.aubelis@fisuel.org ou benoit.dome@fisuel.org.

**Next dates for Fisuel meetings in 2019 and 2020**

- AWG, Africa working group: May 2020 at Tokyo Japan.
- APWG, Asia/Pacifica working group : May 2020 at Tokyo Japan
- EU/MO WG, Europe Middle East working group: First trimester 2020 in France & May 2020 at Tokyo Japan
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- The meetings of the Board of directors will be by e-mail in March 2020 and in May 2020 in Japan.
- The GAM 2020 will be between the 11th and the 15th of May 2020 in Tokyo Japan, including the General Assembly and the Symposium.

**The Newsletter** is available on website www.fisuel.org

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**Website FISUEL:**

The new FISUEL website is in progress. It will bring a better access; it will be more friendly. It is planned to open it for the GAM 2020

**Reminder**

- The administrative correspondence is Patrick Aubelis: patrick.aubelis@fisuel.org
- Head office is 21 rue Ampère, Paris, 75017, France.
- Phone number of the General Secretary : + 33 (0) **6 86 51 84 92**

# FISUEL : new organisation the 1st February, 2020

On January 20, 2020, President Dominique Desmoulins informed Fisuel's new organization by email applicable on February 1, 2020

Dear Directors, dear members,

I would like to inform you of internal organizational modifications at Fisuel.
In order to ensure the lasting effectiveness of Fisuel's corporate missions, we decided, with the interested parties, to modify the distribution of the following missions as follows:

- General Secretary to Patrick Aubelis
- General Delegate to Benoît Dôme

This reorganization is desirable in order to save Patrick's agenda at the start of 2020.
The missions briefly described are:

- The General Secretary: ensures the compulsory administrative and financial procedures as well as the organization and operation of statutory meetings (Board of Directors and General Assembly)
- The General Delegate: organizes the symposiums with the hosts and helped by Patrick within the framework of the General Annual Meeting, and brings his expertise, in a form to be defined, to the regional working groups.

This organization, unless otherwise advised by you, will be implemented from February 1, 2020.
President Dominique Desmoulins

The e-mail address of each are : patrick.aubelis@fisuel.org et benoit.dome@fisuel.org

# Consuel has received KESCO and FESIA

**Reception of the Korean delegation KESCO at CONSUEL in Paris from 28th to 30th October 2019.**

As part of the MOU signed between KESCO and CONSUEL in 2018, a delegation of 5 people from KESCO, led by Mr. Hyojin Choi, visited the CONSUEL to discover in particular the operating mode of the survey and sampling method of inspection, set up in France. After a detailed theoretical presentation in the offices of Gennevilliers, the main part of the visit focused on the demonstration of the implementation of sampling on collective building sites in Paris. The visit ended with a day devoted to photovoltaic plant inspections.
The rich exchanges during these days enabled the delegation to grasp the operating mode on which the verification of electrical installations in France was based. The typology of housing in Korea, characterized by very large estates, carried out in a quasi-industrial manner, could easily allow the implementation of a similar method adapted to the context of Korea.

**Reception of the Japanese delegation of CHUBU ELECTRIC POWER SECURITY at CONSUEL office in Lyon.**

On the proposal of their President, Mr. Masato Yamaguchi, on 27 November 2019, a delegation of 11 people, led by Mr. Susumu Sato, representing the company CHUBU ELECTRIC POWER SECURITY visited the premises of the CONSUEL in Lyon. During this exchange-rich meeting, a detailed presentation of the functioning of the CONSUEL enabled the members of the delegation to better know the system of inspection of electrical installations in France.
CHUBU members also presented the particularities of the Japanese system and its differences from the French system.
This meeting is the second since 2017 and takes place within the framework of the collaborations resulting from the exchanges established during the FISUEL meetings.

*Marc Maslowski – Treasurer Fisuel*

# Three new members at FISUEL

## QUALIFELEC

**Professional and technical association for the qualification of electrical and energy engineering companies**
*109 rue Lemercier 75017 Paris France*
*Tél + 33 (0) 1 53 06 65 20*
*contact@qualifelec.fr - Internet www.qualifelec.fr*

The purpose of the association is to issue qualification certificates allowing access to public and private markets, informing customers about the technical potential of electrical equipment companies.
As the future of the trades in the sector becomes more complex, with the acceleration of technological developments and the energy performance imperative of equipment, in 2020, we are reaffirming our course: contributing to the quality of work thanks to our system of qualification of companies, guaranteeing its solidity, fairness and objectivity.

## ASEC

**Electrical safety and compliance association**
*17, rue de l'Amiral Hamelin, 75015 Paris cedex 16 France*
*Tél + 33 (0) 6 40 71 98 89*
*association@securelectrique.com - web : www.securelectrique.com*

The purpose of the association, in France and abroad, is to help maintain the safety of users of electrical equipment. The means implemented include the promotion of compliance with harmonized European standards, the detection of non-compliant and / or dangerous electrical equipment products through independent tests. All of the association's actions are part of a collaboration with regulatory authorities, in compliance with the rules of free competition, with a permanent concern for objectivity, openness and transparency. The mission is to detect serious risk electrical devices that can be purchased on the French market.

## SERKOLINAS

**PT SERKOLINAS AMAN NUSANTARA**
*Ruko Taman Pondok Kelapa Blok D1, Jl. Pondok Kelapa Raya- Jakarta, Indonesia*
*Tél + 62 21 21874816*
*Serkolinas.amannusantara@gmail.com – Web : www.serkolinas.co.id*

Low Voltage Engineering Inspection Agency
The engineering inspection agency issues the low and medium voltage operating certificate (SLO), certificate eligible for use. It indicates that the electrical installation of your property complies with the national Indonesian standards based on PUIL (General requirements for electrical installation).

# Senegal completes largest wind farm in West Africa

These 46 wind turbines, 117-meter-high, built on the Atlantic coast, are expected to supply 2 million people with electricity

*Mike Hudema (@MikeHudema) tweeted at 11:18 p.m. on Sat, Jan 25, 2020:*
*Senegal will soon be home to the largest wind farm in West Africa - it will power one-sixth of the country*
*By Matteo Maillard Posted on January 08, 2020 at 02h04 - Updated on January 08, 2020 at 16h06*

Taiba NDiaye wind farm is the largest farm in West Africa, designed to generate electricity for at least 20 years. ADRIEN BARBIER / AFP

At the end of the road, huge white masts. This is Taïba Ndiaye, the largest wind farm in West Africa. Soon, its 46 wind turbines will be complete, ready to inject 15% additional energy into the Senegalese electricity grid. And, as of June 2020, this flagship project of 200 billion CFA francs (342 million euros) will provide 158 megawatts.

The country's first industrial scale wind project, Taïba Ndiaye confirms Senegal's ambition to position itself as a regional green energy platform. Since his election in 2012, President Macky Sall has already inaugurated four solar power plants, including the largest in the sub-region. Ultimately, renewable energy should make up 30% of the country's energy mix, and Taïba Ndiaye will supply half of it

*"It changed our lives"*

*But "it took ten years to convince," recalls Yassine Majdallah, director of the Taïba Ndiaye power plant. In 2007, a small team of Franco-Senegalese promoters discovered the potential of the coastal region of Thiès (86 km north of Dakar), swept by the harmattan and the Atlantic winds. Their speed, between 8 and 20 meters per second (m / s), is ideal for energy production. So, quickly, seven hectares of cassava, corn and peanut fields were negotiated with the populations in order to install the turbines. In 2016, Lekela, a company specializing in wind energy, which has already built similar parks in South Africa, Egypt and Ghana, signs a power purchase contract with the National Electricity Company of Senegal ( Senelec).*

Read also Senergy 2, the largest solar power plant in West Africa, inaugurated in Senegal

Under the 117-meter-high steel masts, workers at the Danish company Vestas are fixing the last blades, "*among the largest and most efficient in the world*," said Yassine Majdallah. Sixteen of them have been operating since early December 2019, each producing 3.45 MW. "*They are automated, rotate their nacelle in order to obtain the best inclination relative to the wind and stop if it exceeds 21 m / s*," he continues, reminding in passing that, "*unlike thermal energy, the 'wind does not require continuous human monitoring'*

*Benoit Dôme – DG Fisuel*

# Electriciens sans frontières: Providing “Emergency Pockets” of Solar Energy in Dominica

*This project was supported by Fondation de France, EDF Group, Schneider Electric and Capenergie.*

**Summary:** In Dominica, the increasing frequency and ferocity of hurricanes has had a devastating impact on the island’s vital infrastructure. Following Hurricane Maria in 2017, the Prime Minister of Dominica announced his plan to transform the nation into the first “climate resilient” Small Island Developing State. Electriciens sans frontières (Electricians Without Borders France) was one of the first NGOs to answer the country’s call for assistance, with an ambitious plan to help restore electricity to health centres following worsening natural disasters.
Following the emergency, Electriciens sans frontières put forward a solution designed to assess and retrofit vital public health infrastructure with stand alone photovoltaic kits.These kits use renewable energy to secure an “emergency pocket” of power needs for six health centers on the island. At the same time, the project also contributes to reducing electricity costs through the development of a pilot model on the largest installation to inject any surplus solar energy into the national grid. This pilot solution was deployed to meet the requirements of public health infrastructure during natural disasters, while also tackling climate change through adaptation and mitigation measures. With additional financing, these “emergency pockets” have the potential to be expanded to at least another six health centers on the island, and the solution can be easily replicated in other similar settings in the world.

**Key Facts :** To date, six of Dominica’s Health Centers have been retrofitted with solar panels and electrical equipment to provide an "emergency pocket" of power following natural disasters. These stand alone kits are not reliant on the power grid, which allow the health centers to function autonomously. These kits are accompanied with battery capacity that ensure three days of power even without sun. St Joseph's Health Center, the largest center of the island, has been equipped with a 40 kW solar field. This pilot installation, a first for the island, is plugged into the national power grid.
These renewable energy installations play a key role in contributing to the decarbonization of Dominica’s energy mix.

**The Problem :** As with most Small Island Developing States, Dominica has made a very small contribution to the overall global emissions that cause climate change, and yet it is amongst the most affected countries. The small island state faces a range of acute and long-term risks, including worsening extreme floods and storms.
In September 2017, the category-5 storm Hurricane Maria made landfall on the small island of Dominica, thrashing the country with extreme winds and rain. The storm left its entire population, 72,000 people – 90% of whom live in coastal villages – without electricity and water and up to 20,000 buildings. Health clinics and schools were either damaged or completely destroyed.

**The Solution :** Electriciens sans frontières designed a pilot solution to assess and retrofit Dominica's vital health infrastructure to become more resilient in the aftermath of worsening natural disasters. To do this, they installed “stand alone” photovoltaic kits, using renewable energy to secure an “emergency pocket” of power needs for six health centers on the island. To plan for the future, the project also aims to reduce electricity costs, by creating a pilot model that injects surplus energy into Dominica's national grid. The pilot solution was deployed by December 2018, and helps address emergency health needs during disasters, while also tackling climate change – that is, adaptation to its effects (emergency power to health centres during worsening natural disasters) and mitigation (helping decrease the carbon footprint of healthcare and improve the island’s energy mix).

**Helping the Planet :** The project focuses on implementing pilot mitigation measures to address climate change and reduce the sources of greenhouse gas emissions on the island. To date, the total installed power capacity on the island is 25 MW with about 6.5 MW from small hydro electrical installations, while the rest is dependent on diesel installations and imports. By harnessing solar energy to decarbonize the island’s energy mix and reduce its environmental footprint, it is estimated that the six "stand alone" 2-4 kWp solar kits represent a $CO_2$ emission reduction of around 300 tonnes, while the 44 kWp solar field reduces $CO_2$ emissions by about 700 tonnes (across an average lifespan of 15 years). Moreover, the injection of surplus solar energy produced by the solar panel at St Joseph’s Health Center into the national grid, a first for Dominica, will contribute directly to the reduction of carbon-based energy sources in the country’s energy mix.

**Helping People :** Each of the affected health centres serves a population of around 2,500 people and these communities are the main beneficiaries of this project. Electriciens sans frontières selected health centres in areas with a high poverty rate to ensure they were serving the populations who were most vulnerable.
During natural disasters, such as Hurricane Maria in 2017, these impacted communities face a higher mortality risk due to their geographical isolation and difficulties to reach the island's capital. Dominica’s Indigenous population were taken into

account in the design of this pilot program – the project targeted the health center located in the Kalinago territory, where the Carib minority lives.
Equipping these six health centers with an independent energy source allows these populations to be adequately treated during natural disasters and in the weeks following the disruption, improving their chances of surviving the event. This especially impacts people that rely on permanent medical assistance, often the elderly and the sick. For example, those who depend on breathing equipment risk death in the case of a prolonged power outage.
By upgrading to solar energy, the functioning costs of the health centres have decreased. Instead of spending large amounts of public funds on oil and imported energy, these resources can be reallocated to other social policies and improving the island's socio-economic development

**Spillover Effect :** The project's approach – that is, installing stand alone solar kits with easily removable panels for disaster-prone areas – can be easily replicated on other health centres subject to similar conditions. With adequate funding, this solution has the potential to be extended to a number of public buildings in Dominica, while it also provides a highly replicable model for other Small Island Developing States.

*Electriciens sans frontières*

# ESA and Korea Electrical Safety Corporation sign MOU

*December 11, 2019 – By Kavita Sabharwal-Chomiuk*


From left: David Collie, president & CEO, Electrical Safety Authority and Sung Wan Cho, president & CEO, Korea Electrical Safety Corporation. Photo: Electrical Safety Authority

The Electrical Safety Authority (ESA) and Korea Electrical Safety Corporation (KESCO) have signed a memorandum of understanding (MOU) to strengthen cooperation on electrical safety. KESCO was established by the government of South Korea in 1974 to help prevent electrical safety incidents. It is responsible for inspections of electrical facilities and research and development of technology for the promotion of electrical safety.

The MOU will help establish a framework to encourage collaboration on electrical safety systems that will benefit safety efforts in both countries. ESA and KESCO will share information and participate in training opportunities and seminars to help identify and reduce the leading causes of electrical safety risk.
The two organizations will work together to improve electrical safety in several areas, including:

- Exchange of electrical safety Acts, regulations, policies and standards;
- Exchange of information regarding electrical accident statistics, technical developments and training, including new technologies such as renewable energy and energy storage;
- Reciprocal visits of experts for technical cooperation;

Consulting on electrical safety inspection methodology, such as ESA's new risk-based oversight program; and
Participating in training and seminars, such as continuing education programs and technical training for internal and external audiences.
"Cooperating with other leading experts in the field of electrical safety, like KESCO, broadens our knowledge and brings a different perspective," said David Collie, president and CEO, ESA. "We are pleased to participate in opportunities to promote shared knowledge and best practices to help reduce electrical-related harms and encourage electrical safety."

*Dominique Desmoulins – Président Fisuel*

# ECA : Risk of major fire tragedy remains, claims leading trade body

ECA highlights continued fire risk due to under-qualified workers in its response to 'Raising the Bar' consultation
The risk of further residential fire tragedies, following the fatal Grenfell Tower fire, has been raised by leading engineering services trade association ECA, in its response to the 'Raising the Bar' consultation.
In the aftermath of the blaze at the Grenfell Tower high-rise block in West London, several inquiries have concluded that installer competency is fundamental to public safety. This is particularly the case in buildings such as residential tower blocks, care homes and hospitals.
However, within the electrotechnical industry, many individuals are claiming to be competent electricians despite having trained, in some cases, for only a matter of weeks.

Commenting on the ECA response, ECA Director of CSR Paul Reeve said:
"This week's publication of the inquiry findings into the Grenfell tragedy underline the urgency and vital importance of ensuring that everyone who works in and on buildings, where there are vulnerable residents, must be sufficiently competent."

"We should all remember we are talking about ensuring residential fire safety. It's time to stop messing around with low levels of electrical and fire safety competency, and in particular it's high time to say a final goodbye to so-called 'five-week wonders' - wrongly regarded by some as competent to design and install electrical work in residential and similar premises."

"ECA has mapped the way forward for our sector in our response – we need to avoid settling for lower competencies, which risks another major fire tragedy in the UK."

'Raising the Bar' was prepared by the Steering Group on Competence for 'Building a Safety Future'. Within its response, ECA supports five recommendations regarding the competence of installers:

- There should be accredited third-party certification of all enterprises
- All individuals must have Level 2 or 3 Ofqual-regulated and competence-based qualifications. ECA strongly advocates technical apprenticeships for new entrants
- The electrotechnical sector should use the Electrotechnical Certification card Scheme (ECS)
- CPD should ensure workers are up-to-date with the latest regulations and other developments
- All installers should have core, relevant knowledge of fire safety in buildings, with standardised and mandatory training

The 'Raising the Bar' consultation follows the Dame Judith Hackitt Review into the Grenfell Tower fire.
For more information, please contact:
Omar Khalil, Communications Manager, ECA
T: 07971 141 934 | omar.khalil@eca.co.uk.

About ECA and its members:
ECA is the UK's largest trade association representing electrical, electrotechnical and other engineering contractors in England, Wales and Northern Ireland at regional, national and European level. ECA member-companies are rigorously assessed before membership is approved.
Member firms have a combined turnover in excess of £6 billion annually. Member firms carry out design, installation, inspection, testing, maintenance and monitoring activity across the domestic and commercial sectors. This ranges from power and lighting to data communications, to energy efficiency and renewable, as well as the design and installation of cutting-edge building control technologies.
ECA's near 2,700 members range from SME electrical firms to nationwide engineering contractors and building services firms that employ thousands of professionals on major UK projects. ECA members also support over 5,000 apprentices annually.

www.eca.co.uk
*Benoit Dôme – DG Fisuel*

# Fire Safety Engineering for Africa: A Great Need and a Great Opportunity

**FPE EXTRA ISSUE 48, DECEMBER 2019**

FPE eXTRA SFPE
FROM THE PUBLISHER OF FIRE PROTECTION ENGINEERING MAGAZINE

By: Richard Walls, Antonio Cicione, Birgitte Messerschmidt & Kathleen Almand

In 1990 the population of Africa was 630 million. By 2016 the population was 1.2 billion. By 2050 it is estimated that Africa will be called home by 2.5 billion people. Africa has almost no formal university degrees in fire safety engineering, lacks firefighting resources, has a weak code enforcement environment and lacks facilities for evaluating and certifying fire safety products. *Africa has a fire problem.*

This brief article summarises a paper on African fire safety presented at the 2019 Interflam Conference, in what could be seen as a "call-to-arms" to the fire engineering fraternity to address a looming problem.[1] A growing population, large investments in infrastructure, widespread mining activities, the discovery of various mineral deposits, rapid rural-urban migration and large-scale energy projects means that Africa needs good fire protection engineers, and also needs to develop an environment conducive to fire safety. Fire risk on the continent has grown exponentially in the past decades and without a holistic approach to fire safety it is likely that many people will be affected by the destructive nature of fire. Figure 1 is an infographic showing example of primary natural resources, examples of major infrastructure projects, population growth and urbanisation in Africa. This just presents a sample of activities but does provide a taste of the activities occurring on the continent. In the midst of the challenges the international fire protection community is now confronted with many African opportunities such as: new markets for fire protection products, the ability to uplift communities through training and support, academic research into relatively new fire safety problems and access to bright young minds who could make a difference in fire safety both locally, and internationally.

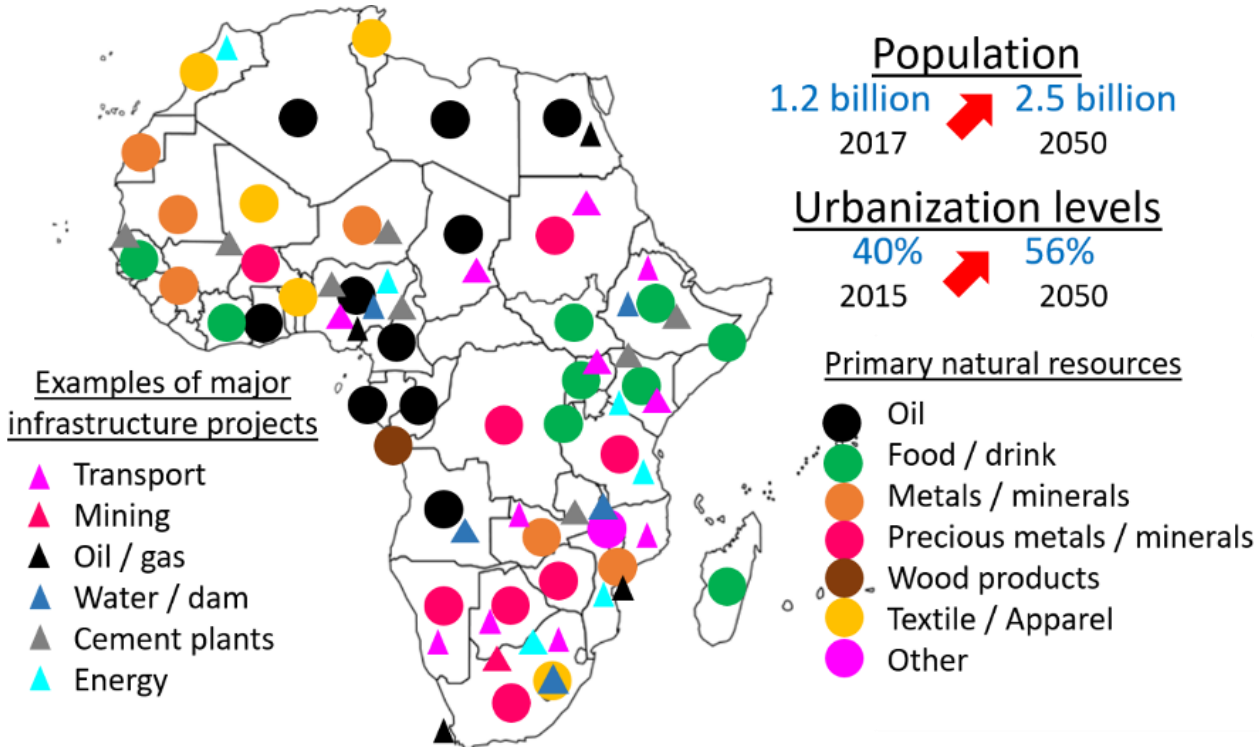


Figure 1: Infographic showing important factors and developments in Africa that influence fire safety needs (Information from the website hereunder page 10)

**Recent fire disasters and Statistics in Africa**

Table 1 lists a number of fire incidents in Africa that have occurred in recent years. All sectors are affected, in a similar manner to that experienced in developed countries. However, with high population densities and limited code enforcement such incidents become more common than experienced in countries with a strong fire safety environment and know-how. Incidents such as the fire in the medical store in Ghana can disrupt medical supplies to an entire region, as in this case the store contained supplies for treating HIV/AIDS, Ebola, tuberculosis, amongst other diseases, for 216 districts in Ghana alone.[6]

Table 1: Examples of recent fire disasters in Africa [1]

| Location & year: | Incident : |
|---|---|
| Knysna, South Africa, 2017 | Wildland-urban interface fire. Largest deployment of firefighters in history of country. Almost 1000 homes destroyed. |
| Cape Town, South Africa, 2017 | Informal settlement fire in densely populated settlement named Imizamo Yethu. 10,000 people left homeless. |
| Tema, Ghana, 2015 | Largest storage facility for medical supplies in Ghana destroyed in fire. Repository also served other West African nations, thereby affecting medical supplies for the entire region. |
| Kumasi market, Ghana, 2012 | Fire in the Kumasi market where 150 shops were destroyed. The market also had fires in 2009 and 2010. |
| Cairo, Egypt, 2019 | Railway station fire after a train's fuel tank exploded. At least 25 dead. |
| Nairobi, Kenya, 2018 | Market fire with 70 injured and 15 killed. Multiple fires have occurred in the area. |
| Lagos, Nigeria, 1999-2007 | Study on multiple pipeline fire disasters. 646 deaths were recorded at a single hospital due to pipeline fires, with around 56% of explosions being due to deliberate pipeline damage. |
| Lagos, Nigeria, 2013 | 22 storey building, fifth tallest building in Nigeria. Experienced significant structural fire. |
| Beitbridge, Zimbabwe, 2019 | Border control warehouse for storing confiscated goods destroyed in fire. Followed previous warehouse fires in the area. |
| Phalaborwa, South Africa, 2018 | Copper mine with conveyor belt fire in a tunnel that left 6 miners dead. |

Figure 2 (a) Fire disaster in Imizamo Yethu (Cape Town, South Africa) which left 10,000 homeless, and (b) aftermath of the Knysna fire disaster which destroyed almost 1000 homes (images used courtesy of Ryan Heydenrych of Vulcan Wildfire Management)

**Statistics** from South Africa (which typically has a more developed economy and better enforcement of building construction standards than its neighbours) indicate the number of fire deaths reported by fire brigades is increasing at around 5-10% per annum (but based on mortuary data the total number of people killed in fire related incidents could be as many as 4-5 times higher than this, as many people die in hospital after an incident, which is not reported in brigade statistics). Fire statistics from most developed nations shows an opposite trend than in developing countries. The US has seen a decrease in home fire deaths of 55% from 1977 to 2017. England has seen a decrease in fire deaths in dwellings of 55% from 1980 to 2018.

**Roadmap for African fire safety**

A roadmap for improving fire safety has been proposed based on the NFPA® Fire & Life Safety Ecosystem, as shown in Figure 5. It may have been thought 100 years ago that significantly improving fire safety to the point that staff at fire brigades would be reduced was unthinkable, but this is now happening in various developed countries. In the same manner, hopefully decades from now fire safety in Africa will have improved to a level that is currently not imaginable. A detailed description of all the points of the Ecosystem can be found in the original paper this work is based upon, with just a summary of the main points below.


Figure 5: The Fire and Life Safety Ecosystem (used permission of the NFPA)

The main "cogs" when producing countries that are safer in terms of fire are:
Government Responsibility: Government plays an essential role in the enabling of infrastructure for fire safe buildings, and in the developing world this element of the ecosystem is a building block for all others. Political instability, such as in those countries in Africa experiencing war or major governmental crises, will hinder fire safety improvements.
Investment in Safety: Government and key global institutions must be prepared to invest in fire safety as a key enabler of economic development.
Development and Use of Current Codes: Open, transparent, and regularly updated building and fire prevention codes are key for improving safety.
Code Compliance: Enforcement of codes by a suitably qualified workforce is essential.
Reference Standards: Quality fire protection products and system are a given in a mature fire safety ecosystem and are driven by a mature set of product safety standards.
Preparedness and Emergency Response
Informed Public: When the public is aware of fire safety issues significant improvements can be made.
Skilled Workforce: This area is one where African colleges and universities should seek to work with international collaborators to rapidly advance in improving fire safety. It is important that education be developed for all the different levels required to implement fire safety: (i) fire science postgraduate education (ii) engineering education, (iii) technician level, (iv) fire services and operational training, (v) management of facilities, (vi) regulatory enforcement bodies and also (vii) in associated construction fields such as architecture.
Although Africa is far behind in terms of fire safety engineering knowledge, technical specifications, testing facilities, response capacity and similar issues, the continent can, and must, draw upon the resources available in the international community. Stellenbosch University, South Africa, is currently developing a fire safety engineering postgraduate program to try upskill engineers on the continent. Through developing online courses and partnering with other universities it is hoped that the work being developed will be able to have a continental impact.

ref: https://www.sfpe.org/page/FPEeXTRAIssue48?_zs=e5HJg1&_zl=arXO6
*Benoit Dôme – DG of Fisuel*

# Solar NGO Electriciens sans frontières awarded Zayed energy prize

The French non-governmental organization, which provides solar kits to refugee camps and disaster affected communities, won the energy category of the 12th Zayed Sustainability Prize.

JANUARY 13, 2020 **JONATHANGIFFORD**

The winners of this year's Zayed Sustainability Prizes were announced in Abu Dhabi today, with a French solar NGO scooping the energy award. Electriciens sans frontières – Electricians without borders (EWB) – claims 50,000 people have benefited from its projects. The NGO aims to improve water and electricity access for a million people.

With an annual budget of €2.9 million ($3.2 million) generated by donations and public funding, the $600,000 prize money will help the organization expand activity this year. Tania Chauvin, a project manager for the EWB, said the number of displaced people picked up in the latter stages of last decade so the need for the NGO's programs has increased.

EWB project manager Tania Chauvin and President Hervé Gouyet.
*Image: Jonathan Gifford, pv amgazine*

"The year 2018 saw the highest number of refugees in the world ever," said Chauvin. "It's a prolonged crisis, so it's important we continue to have an impact."

**Improved security**

There are 129 projects run in 38 countries by the EWB. The provision of solar lighting for off-grid refugee communities is particularly important for the personal safety of residents. Lighting alone can reduce assaults in such areas and particularly benefits women and girls.

Notable projects run by the EWB include the provision of solar lighting and training programs at the Za'atari refugee camp in Jordan, which had grown to accommodate close to 80,000 Syrian refugees by 2018 – making it Jordan's fourth largest city at the time. The EWB began work at the Za'atari camp in 2012.

The training programs the NGO provides ensure long term maintenance of solar kits and lights. In Cox's Bazar in southeastern Bangladesh, the EWB was involved in installing 75 solar street lamps. The project was rolled out with French multinational Schneider Electric. Some 22 locals were trained in solar installation and maintenance as part of the program.

**Snowball effect**

"The idea is to have this kind of snowball effect, so first we train the trainers," said Chauvin. "Our engineers worked with the local NGO, 'Friendship', which handles activities within the camp. We first trained 10 from the refugees and then 10 from the local population – to alleviate any tensions [between the two groups]. We then came back to see how their progress is doing and stay in permanent contact via WhatsApp – they can take photos and send it to our volunteer teachers."

When the streetlight program was being introduced, Cox's Bazar was experiencing an influx of Rohingya refugees from Myanmar. The training programs were particularly important as many Rohingya could not find work in Bangladesh.

The EWB said one challenge it continues to encounter is the provision of cheap, low-quality solar kits to refugee camps. Chauvin said aid agencies are working fast to provide basic services but the resulting low-quality solar kits cause waste issues when they fail.

"It's understandable [in] the short term but can lead to a lot of waste very rapidly," she said. "At Cox's Bazar, it was already one of the poorest parts of Bangladesh, subject to monsoons and flooding, and with one million refugees camping in a short time the failed equipment can cause huge waste really fast."

The EWB first became active in the provision of its training programs and installations in 2010, in response to the Haiti earthquake. The NGO has partnerships with French energy companies including utility Engie and solar streetlight provider Sunna – itself a 2018 Zayed award winner.

Electriciens sans frontières said it is looking to develop more partnerships with the global solar industry, to provide high quality products and continue to "build necessary skills" in refugee and local communities.

The Zayed Sustainability Prize last year evolved from the Zayed Future of Energy Prize. It now includes health, food, water and energy categories. The other finalists in the energy category were off-grid supplier Kingo Energy, from Guatemala: and Germany's SolarKiosk.

*Electriciens sans frontières*

# How to identify the right electrician to carry out new electrical inspections?

On 13th January 2020, plans were laid out in Parliament for 'Electrical Safety Standards in the Private Rented Sector (England) Regulations 2020'. Once ratified by the House of Commons and the House of Lords, these new regulations will take effect from July 1st for new tenancies and April 1st 2021 for incumbent tenancies.
Can any "Competent Person" carry out this work?
In essence, the definition of a competent person within the electrical industry is a person possessing sufficient technical knowledge, relevant practical skills, experience and qualifications for the nature of electrical work undertaken. Competent Person Scheme (CPS) operators such as the NICEIC, Elecsa and NAPIT assess an electricians proficiency through periodic assessment and once satisfied, place them on the Electrical Competent Persons register, which can be checked online; www.electricalcompetentperson.co.uk

However, it is important for Landlords to understand that simply because an electrician is registered with a CPS, it doesn't automatically qualify them to carry out the proposed Electrical Installation Condition Reports (EICR). It is extremely likely that when the regulations come into force, electricians must hold a City & Guilds 2391 Inspection & Testing qualification or the equivalent EAL Level 3 Award in Electrical Installation Inspection, Testing, Certification and Reporting.
Thankfully, there are easy ways to check if an electrician has the necessary qualifications to carry out the inspection report. Scheme Providers such as the NICEIC have an 'Approved Contractor' status for those with the relevant Inspection & Testing experience. Should the electrician in question hold a Joint Industry Board (JIB) Gold Card with a JIB Grade of 'Approved Electrician', then they are also able to carry out the inspection.
While this can provide a Landlord with a certain amount of confidence at a glance, it is still important to get confirmation that the electrician holds the appropriate qualification.

**Current Landlord responsibilities**
Despite there fact that there are currently no statutory requirements for Landlords to undertake annual safety checks on domestic electrics as there are with gas, the Institution of Electrical Engineers (IEE) recommends the periodic inspection and testing of the installation at least once every 10 years. However, this is left to the Landlords discretion.
Any appliances supplied by the Landlord should either be new or checked by a qualified electrician before the property is let. It is advised that all paperwork regarding the item (receipts, warranties, certificates of inspection) should be kept for a minimum of six years and made available to the tenant upon request.
Other recommendations for best practice include:
Check wiring condition for any obvious damage or faults
Check the correct fuse ratings are used throughout the property
Ensure all supplied appliances are periodically PAT tested
Keep detailed records of any and all safety checks

**New regulations**
Once the proposed regulations come into practice, it will be mandatory for private landlords and letting agents to ensure electrical installations are periodically inspected and tested at a minimum of once every five years by a qualified electrician, whether the property is occupied or not.
Not only this, but the following obligations must be fulfilled by the Landlord:
The latest report must be provided to any prospective tenant within twenty-eight days of request
The most recent report must be supplied to a new tenant prior to occupying the property
The report must be supplied to an incumbent tenant within twenty-eight days of taking place
A copy of the report must be kept and provided to the electrician undertaking the next inspection.

**Obligation to repair faults**
If a safety report identifies faults, repairs must be completed by a qualified and competent person within 28 days of inspection. Once completed, the Landlord must ensure they obtain written confirmation confirming that the repair has been rectified and meet the required safety standards. This must be also be supplied to the tenant within 28 days.
According to Electrical Safety First (ESF), a charity dedicated to reducing the number of injuries and deaths caused by electricity, more than half of all domestic fires are caused by electrical faults. They hope that these new regulations will protect the millions of private renters across the UK.
Martyn Allen, Head of the Electrotechnical Division for ESF says the new regulations will allow tenants to hold their landlords responsible for deficient electrical safety. He added: "It is now vital this new regulation has teeth and that the enforcement body has the resources to act when necessary, to protect the tenant."

**Involvement by local authority**

Should the new regulations not be adhered to by a Landlord, stipulations give the local housing authority (LHA) the power to arrange repair work on the Landlords behalf.

Should a tenant raise a concern with the local authority:

Upon request, an up-to-date report must be provided to the LHA within seven days

Where repair work is urgently required, the LHA can serve a 'remedial notice'. The Landlord will have twenty-eight days to take action from the date served

Should repairs not be undertaken, the LHA can access the property then recover costs from the Landlord.

Continued breaches can lead the LHA to imposing a fine of up to £30,000

Outgoing Minister for Housing Heather Wheeler said of the new regulations "Everyone deserves a safe place to live. While measures are already in place to crack down on the minority of landlords who rent out unsafe properties, we need to do more to protect tenants. That's why we will introduce powers to enable stronger electrical safety standards to be brought in along with tough penalties for those who don't comply".

Newly appointed Minister for Housing Esther McVey continued "the Government to committed to introducing mandatory five-yearly electrical safety inspections for electrical installations in privately rented properties".

Content provided by Trade Skills 4U.

**Commenting on the announcement of the imminent introduction of mandatory electrical safety checks in the Private Rented Sector Martyn Allen, Technical Director at Electrical Safety First commented:**

"Today's commitment by the Government to bring mandatory electrical safety checks into force is a success for millions of renters and their landlords in England.

It has been long overdue that the dangers posed by electricity in the home were taken as seriously as that of gas and this legislation will act as a protective measure for millions. Whilst we welcome this crucial step in protecting tenants, the safety of electrics should not be a lottery based on tenure type and we hope to see the regulation mirrored in the social housing sector in the near future.

We have heard harrowing tales of fatal accidents caused by unsafe electrics in rented properties and this new regulation will act as a step to ensuring such tragedies don't happen again.

Tenants around the country will finally be able to hold landlords to account for the safety of electrics in their property and while we acknowledge the majority of landlords already take suitable measures to ensure their properties are safe, this new law will hold those that fail to do so, to account.

Private landlords will now have the clarity from Government as to when this new regulation will come into force and with it will serve as a way to better protect their assets through the frequent upkeep of their property's electrics.

It is now vital this new regulation has teeth and that the enforcement body has the resources to act when necessary, to protect the tenant. "

*Benoit Dôme – DG Fisuel*

# FISUEL GAM2020 invited by FESIA in Tokyo Japan

FESIA

## FESIA will welcome FISUEL GAM 2020 and the international symposium.

GAM2020 will take place from May 11 to May 16, 2020 in Tokyo

All information if needed, please contact the following "e-mail":
fisuel-tokyo2020@denki-hoan.org

*Patrick Aubelis SG, Benoît Dôme DG from Fisuel & GAM2020 organisation team to Japan*