

**Policies to protect people, property and
communities from electrical risk
2021 and Beyond**



Who we are

Electrical Safety First is the UK consumer charity dedicated to preventing deaths, injuries and fires caused by electricity. Our aim is to ensure everyone can use electricity safely in their homes. We are recognised by government and industry as the leading campaigning charity and technical authority on home electrical safety. We:

- collaborate with and advise governments on improving policy on electrical safety.
- campaign on behalf of consumers and electrical trade professionals to improve safety regulation and ensure safety messages are appropriate, up-to-date and well communicated.
- work with tenants, landlords and homeowners to reduce deaths and accidents in the home.
- provide expert information and advice to help people protect themselves from unsafe electrical goods, including counterfeit, sub-standard and recalled products.



Helping you protect people and deliver safer homes

Electrical Safety First is the consumer safety charity dedicated to reducing the number of deaths, injuries and accidents caused by electricity. Nearly three quarters of house fires are caused by electricity in Scotland each year. **To help reduce these risks and wider electrical dangers in the home, we offer a number of policy proposals to assist with the development of manifestos for the Scottish Parliament Elections in May 2021.**

Much progress has been made during this parliamentary session, with the introduction of significant protections for tenants living in the rented sectors, new consumer safeguards around product recalls, a focus on improving awareness of registered electricians, and a national campaign on the importance of white goods safety. However, there is still more we can do by working together.

Public policies will need to be recontextualised to address and respond to the ongoing challenges presented by COVID-19. **We believe our proposals would provide savings to the public purse whilst helping to protect people, property and communities from the significant dangers posed by electricity.**

Electrical Safety First has five key asks:

- 1.** A joined-up approach across government departments to work to reduce the number of house fires caused by electricity, to protect the most vulnerable.
- 2.** A common standard for electrical safety in housing so everyone - regardless of tenure - is equally protected.
- 3.** Consumer safeguards around substandard, counterfeit and faulty electrical products.
- 4.** Measures to ensure the safety of electrical installations in homes, including ways to easily find qualified and competent electrical professionals.
- 5.** A clear focus on the future challenges for electrical safety, including the decarbonisation of energy in housing and the emergence of the smart home and electric vehicles.



1. Reducing House Fires & Protecting the Most Vulnerable

During 2019, there were nearly ten house fires a day caused by an electrical source in Scotland – 3,429 in total, accounting for 74% of all house fires.¹ This percentage has remained at similar levels over the last five years whilst the overall number of domestic fires has slowly fallen. Available research estimates that the average cost of a domestic fire is £24,900, of which £14,600 is attributed to injuries and fatalities and £7,300 is due to property damage.² **This would suggest that electrical-related house fires may have cost the Scottish economy £35 million in 2019.**³ Given the sustained level and economic impact of these fires, we need a cross-government plan and a review of the Fire and Rescue Service Incident Recording System (IRS) to help identify trends and risks from new technology products such as mobile phone, e-cigarette, smart home and electric vehicle chargers. **Older and vulnerable people can be most at risk of fire** because they often live in old or poor quality housing which contains faulty electrics, own older appliances and/or are unable to afford essential electrical repairs. **The risk of dying in a fire for older people is over twice as high as the average for all ages.**⁴ These risks are heightened by conditions such as dementia and other degenerative syndromes.

Policy Proposals

- A cross-governmental plan to reduce the number of accidental electrical house fires.
- A more up-to-date IRS fire reporting system that allows for better recording of incidents caused by modern technology.
- Sustained support for the Scottish Fire and Rescue Services to continue their proactive and preventative work.

¹ Electrical Safety First methodology of fire data provided by the Scottish Fire and Rescue Service in 2020.

² <https://webarchive.nationalarchives.gov.uk/20121105004822/http://www.communities.gov.uk/documents/fire/pdf/144524.pdf>

³ There were 3,429 electrical-related house fires in 2019. 572 resulted in a death or casualty. Therefore, based on the estimated economic costs of a house fire of £7,300 and £24,900 where an injury or death was recorded: 2,857 x £7,300 + 572 x £24,900 = £35,098,900

⁴ 'Age Safe Scotland' by Electrical Safety First: <https://www.electricalsafetyfirst.org.uk/what-we-do/age-safe-scotland/>



- Specific interventions to protect the most vulnerable, such as the option of a free electrical safety check for homeowners who meet certain criteria, and extra support for bodies involved in addressing critical electrical repairs.

2. Moving towards a common housing standard

Despite electricity being the number one cause of Scotland's domestic fires, housing legislation and standards are subject to a 'tenure lottery' - with different 'levels' of protection for different tenures. Following our 'Inequality Street' campaign, electrical safety enhancements have been achieved for tenants living across the rented sectors. However, despite accounting for the majority of Scotland's housing (60% in total) and being home to most older people (62%)⁵, the owner-occupied sector is lagging behind with the lowest electrical safety requirements. Over half (51%) of Scottish homeowners either have not had an inspection or don't know if their property has been inspected by an electrician in the last ten years.⁶

There are also risks associated with the divergent safety regimes applicable in mixed-tenure blocks given that nearly half (47%) of electrical dwelling fires occurred in flats or tenements during 2019.⁷ The rapid growth of the Short-Term Let sector and its lack of a consistent regulatory safety framework adds to the impetus for a fair and equal electrical safety standard for all housing in Scotland.

Policy Proposals

- A move towards a common electrical safety standard for all homes.
- Mandatory RCDs for social housing, which will be required in the PRS from 2024.⁸
- Owners of flats should be required to have a mandatory five-yearly electrical safety check.

⁵ <https://www.gov.scot/publications/scottish-house-condition-survey-2018-key-findings/>

⁶ YouGov survey of Scottish homeowners with fieldwork undertaken 21st - 28th February 2017. Unweighted sample of 1884.

⁷ Electrical Safety First methodology of fire data provided by the Scottish Fire and Rescue Service in 2020.

⁸ An RCD, or residual current device, is a life-saving device which is designed to prevent you from getting a fatal electric shock if you touch something live, such as a bare wire. It can also provide some protection against electrical fires.



- A requirement for landlords to register any electrical appliances they provide with lets and to ensure they are not subject to any product recalls or safety alerts.
- Short-term lets being legally required to meet the electrical safety requirements of the Repairing Standard.

3. Protecting Consumers from Unsafe Products

Electrical products cause the majority of house fires in Scotland – accounting for around 80% each year.⁹ While user misuse is a key factor, there are an increasing number of issues which could be tackled with preventative policy intervention. **Product recalls are an ongoing concern, with our research showing most achieving just a 10-20% success rate.**¹⁰ We found that only a third of Scottish consumers register their electrical appliances.¹¹ **There are ongoing issues with the safety of white goods, which caused a house fire almost every day in Scotland during 2019.**¹² Our research has also indicated a particular problem with the sale of counterfeit and sub-standard electrical items online, **with one in five Scottish residents (one million people) having purchased a fake electrical product that was advertised as genuine.** Counterfeit electrical products are placing the public at risk of serious electric shock and fire. While this is enough reason to act, there are also financial implications to consider. Legitimate brands have suffered a loss of almost £8 billion in revenue and illicit trading has resulted in the loss of around 60,000 jobs in the UK.¹³ **While consumer protection powers are reserved, the Scottish Parliament has demonstrated it can protect consumers from unsafe products through amendments to the Consumer (Scotland) Act.** We need to continue this innovative approach towards consumer safety in Scotland.

⁹ Electrical Safety First methodology of fire data provided by the Scottish Fire and Rescue Service in 2020.

¹⁰ <https://www.electricalsafetyfirst.org.uk/media/1259/product-recall-report-2014.pdf>

¹¹ YouGov survey of 2102 people, representative of the UK population, carried out in January 2020.

¹² <https://www.firescotland.gov.uk/news-campaigns/news.aspx?page=1&tags=prevention&year=2020&month=0>

¹³ <https://www.tsscot.co.uk/priority-areas/counterfeit-goods-online/>



Policy Proposals

- Consumer safety policies developed and delivered at a devolved level to protect people from defective or faulty electrical products.
- Identify opportunities across all government areas to introduce measures to both promote and/or require product registration of electrical goods.
- Run public awareness campaigns to raise awareness of potential risks associated with electrical goods being purchased from third parties via online marketplaces, and white good safety.
- Additional resources given to Trading Standards in Scotland to enforce action against sales of unsafe electrical goods.

4. Electrical Installations and Electricians

Sub-standard electrical work and failings in workmanship can and do result in death, injury and loss of property through fire. However, the benefits of using a qualified and competent electrician for electrical work and repairs are not understood by many consumers. Registered electricians are insured, so you are protected if anything goes wrong. Their work is also regularly assessed and they work to the BS7671 safety standard, as well as being regulated by government, which provides consumers with further peace of mind. **Our research with Scottish homeowners found that over 50% had low awareness of the importance of electrical safety. A separate study highlighted that 58% of those polled would ask friends and family for a recommendation when finding an electrician to carry out work in their home¹⁴ who may not have checked or know if they are registered or appropriately qualified.** The next government must continue to promote the benefits of using an electrician registered with one of the government-approved schemes for any electrical work in a home, and this experience should be made as simple as possible for consumers with a single, unified, register.

14 <https://www.gov.scot/binaries/content/documents/govscot/publications/minutes/2018/04/electricians-working-group-minutes-january-2018/documents/electricians-working-group-paper-second-meeting-protecting-consumers-way-forward-january-2018-pdf/electricians-working-group-paper-second-meeting-protecting-consumers-way-forward-january-2018-pdf/govscot%3Adocument/Electricians%2BWorking%2BGroup%2B-%2B%2Bpaper%2Bfor%2Bsecond%2Bmeeting%2B-%2BProtecting%2BConsumers%2B-%2BThe%2BWay%2BForward%2B-%2BJanuary%2B2018.pdf>



Policy Proposals

- Creation of a single register to make it easier for consumers to identify qualified and competent electrical professionals.
- Run a sustained government-backed education campaign to help change consumer attitudes around the importance of electrical safety in the home and using registered electricians.

5. Future Challenges

In April 2019, a 'global climate emergency' was recognised with a target to reach net-zero greenhouse gas emissions by 2045. Heating homes is a significant part of our energy consumption and greenhouse gas emissions. Decarbonising heat – meaning reducing and eliminating the greenhouse gases emitted during its generation and use – is essential to tackling climate change and a major challenge on the horizon is the electrification of heat. Currently, 81% of homes in Scotland are heated by gas.¹⁵ **The huge increase in electrical appliances, such as heat pumps and electric boilers, together with a shortage of trained competent installers and a lack of familiarity with electrical heating may impact on electrical safety.** There has also been increased investment in a range of measures to accelerate innovation in new low-carbon technologies such as Electric Vehicles (EVs).

Our early research on EVs suggests that drivers are charging their vehicles dangerously due to lack of public infrastructure. We surveyed 1,500 EV owners across the UK, including both electric and hybrids, revealing 74% believe that a lack of public charging points near their home has led them to use domestic multi-socket extension leads.¹⁶ More than 8 out of 10 respondents in Scotland admitted they're aware these should not be used outside. **Almost half of Scottish EV users who charge with the aid of an extension lead have left cables running to their vehicle when it has been raining.** We also found a high number resorting to 'daisy-chaining' extension leads to reach

¹⁵ <https://www.gov.scot/publications/scottish-house-condition-survey-2018-key-findings/>

¹⁶ Consumer research commissioned by Electrical Safety First and conducted by Censuswide surveying 1,500 owners of plug-in vehicles, whether all-electric or hybrid, in the UK, nationally representative of all UK EV owners



their vehicle; a method whereby multiple extension leads are plugged into one another to cover a longer distance. Daisy-chaining is advised against in all circumstances due to the resulting heightened risk of electric shock and even fire.

Policy Proposals

- A review of housing standards to ensure Scotland's existing dwellings can safely accommodate an increased use of electricity in the future, including advancements of new technologies in the home.
- New infrastructure and planning measures must be introduced to meet the need for more domestic charging points for EVs and address specific issues with installing these for flat dwellers and in areas of high-density housing.
- Housing policy must reflect the need to decarbonise our homes as a critical milestone on the net zero path to 2045, and electrical safety must be an integral part.

We believe our proposals would help to reduce the number of deaths and injuries caused by electricity. These policies would improve the safety of housing in Scotland and the well-being of the most vulnerable in our society, as well as provide significant cost savings to public finances. Assumptions used in costing our key proposals are provided in Appendix 1. Further information is available on request.

For further details, please contact: Wayne Mackay, Public Affairs Manager,
Scotland and Northern Ireland, Electrical Safety First at:
wayne.mackay@electricalsafetyfirst.org.uk



Appendix 1 – Key Assumptions used to Cost Electrical Safety First's policy proposals

Policy Proposal	Estimated cost (£)	Responsibility for cost	Frequency of measure (if applicable)	Key Benefits
Electrical safety check, or EICR	175 per property	Owner-occupiers	Five-yearly in mixed-tenure blocks and owner-occupied flats. Ten-yearly for all other owner-occupied properties.	<ul style="list-style-type: none"> Helps to protect people and property from electrical risks. Reduces costs on the public purse from electrical accidents and fires. Provides assurances to home insurers.
		Short-Term Let providers	Five-yearly	
Residual Current Devices (RCDs)	200 per property.	Social housing providers	One-off cost	<ul style="list-style-type: none"> Protects against the risks of electrocution and fire caused by earth faults.
New consumer register of electricians	Available on request from Electrical Safety First.	Government and/or industry	One-off cost for the design and implementation of the register. Maintenance and upkeep of register would be covered by annual membership costs.	<ul style="list-style-type: none"> Provides a one-stop shop for consumers to find qualified and competent electricians, as opposed to the multiple offerings available now. Promotes healthy competition by industry which would benefit the consumer. Provides a platform to promote important safety advice and information.

- i. We have estimated the costs for electrical safety checks and RCDs through our experiences and knowledge of working with the electrical industry. However, actual costs will vary depending on factors such as the size and type of a dwelling.
- ii. In relation to the frequency of electrical safety checks, these intervals are recommended in BS 7671, the UK Standard for the safety of electrical installations.
- iii. Further details on our proposals for a new consumer register of electricians can be obtained by contacting Wayne Mackay, Public Affairs Manager, Scotland and Northern Ireland, Electrical Safety First at: wayne.mackay@electricalsafetyfirst.org.uk

