

## **Consultation on the Regulation of Electricians – The Scottish Government**

### **Overview**

Currently anyone can call themselves an electrician, without the need for any qualifications or competency. This can lead to customers, especially domestic consumers, hiring unqualified or less competent individuals, resulting in faults that can lead to fire or personal injury, such as electric shocks.

The consultation considers whether regulatory measures are required to give greater protection to the public and reduce the level of poor electrical workmanship by a persistent rogue trader element.

The consultation also discusses increasing consumer awareness and helping consumers (domestic & commercial) identify or verify competent and qualified electricians.

The Scottish Government is gathering information and views on whether regulations should be introduced in relation to electricians. We want to hear whether you think there is a need for electricians to be regulated. While the focus of the consultation is on domestic work carried out for individual consumers, it will also apply to commercial and industrial work.

The consultation questions are:

1. Are there any changes that could be achieved by voluntary means?
  - 1.1. More info: The changes would relate to any voluntary measures to raise standards, give greater protection to the public and reduce the level of poor electrical workmanship by a persistent rogue trader element.

The Institution of Engineering and Technology (IET) (<https://www.theiet.org/>) recommends that regulatory, rather than voluntary, measures are used to protect the public and ensure good electrical workmanship. Bad workmanship can lead to electrical fires, resulting in injury, loss of life and damage to property. The risk with voluntary measures is that they can be ignored by rogue elements. Such traders could still work within the law, whilst leaving the public unprotected or unsafe. Poor practices would undermine quality and safety standards, and undercut delivery from quality organisations.

There are various competent person schemes already in place. There's also the ability for companies to be certified, such as the scheme operated through membership of the trade organisation, SELECT. However, many people looking to employ an electrician may be unaware of these schemes. Because of that, rogue elements are able to continue unchecked.

For measures to be effective, there first needs to be industry-wide consensus and assurance on standards and professional registration. Consensus would be needed on the required skills, knowledge, experience and behaviours (SKEB) at different levels and for different sectors - with mandatory continuous professional development (CPD) to maintain skills levels. Oversight of the process itself would ensure that the criteria and levels adapt and remain aligned in the light of future technological developments.

2. If voluntary measures are pursued and implemented effectively, would this significantly reduce the need for statutory measures?

We believe that voluntary measures won't reduce the need for statutory ones. Voluntary measures may introduce more confusion than clarity for consumers. The key aspect here is "implemented effectively". To work, it would need the general public to be sufficiently aware of where to get information, to be well-informed and be willing to research for suitably skilled electricians for the required work (domestic, commercial or industrial). This demands available, easily understood and standardised technical information, aspects which are not fully in place at present. In addition, voluntary measures would only work with a culture shift amongst the public ie if people were to become averse to using non-registered electricians.

Unfortunately the introduction of Part P to the electrical industry enabled training providers to offer short electrical courses, that circumvented traditional, more thorough apprenticeship schemes. This has led to an increase in less technically qualified electricians working in the trade, with resultant concerns over reduced standards of installation, poor workmanship and implications for safety.

### 3. Are there any legislative changes apart from protection of title or regulation of electrical work that would have a similar impact that the Scottish Government should explore?

Protecting the title of electrician across the whole UK is the most effective measure - a registration scheme that only permits those individuals deemed competent (electrically skilled) to carry out the relevant electrical work.

There are already a number of statutes controlling various aspects of electrical work. These are largely ineffective because they lack any realistic enforcement.

A measure similar to the 'Part P system' used in England could be introduced. However, as described in the response to Q2, in its current form Part P has exacerbated the problem of rogue traders. Its flaws would need addressing before it could be considered a viable alternative to protected title. In any introduced system, registration as competent must be on an individual not a company level, so as to prevent untrained staff appearing as competent under a company umbrella.

More pressure should be put on Scheme Providers to ensure that registered persons have sufficient knowledge and experience to carry out the particular electrical work. This includes more regular assessments of their work. Currently many Scheme Providers allow the registrant to choose which jobs are assessed. This enables registrants to select 'their best job' for assessment. It means that poor or rushed installations, where the installer didn't have the requisite knowledge and skill, may go unnoticed by the Scheme Provider.

The IET believes that there should be an agreement between the client, installer and Scheme Providers that states that at any time within a 6-12 month period an independent assessor can inspect the work that has been carried out. There needs to be product liability protection for consumers - if work is deemed inadequate, the Scheme Provider is responsible for putting it right and the installer penalised appropriately.

### 4. What measures would be essential to make protection of title or regulation of electrical work effective?

There are many types of electrician, and others who carry out electrical work (such as refrigeration engineers, fire alarm installers, heating and ventilation engineers etc). As such, each protected title would need the categories and allowed scope of work defining and aligning closely – to avoid people

trying to get round the legislation. They would include minimum levels of qualifications and experience that would be assessed. The process would need a transitional phase, flexible enough to offer pathways for less qualified individuals to demonstrate that they have the necessary skills, knowledge and experience. The process needs to take account of prior learning and equivalent historical or overseas qualifications, and to accommodate those who entered the industry through alternative routes.

There should be opportunities for work-based assessments, carried out by skilled assessors who would consider site-based capabilities and experience in addition to qualifications. The most important aspect is that the person carrying out / supervising the work is recognised as competent.

The process would need resourcing effectively to ensure that all eligible individuals could receive the requisite status without excessive financial burdens. To enforce protection of title and avoid abuse, it should be an offence to charge for electrical works if the operative is not registered to use the new title.

As mentioned in the Q2 response, to be effective there must also be suitable provisions in place to advise and inform the public. This includes a unique searchable public register to enable people to check the credentials of electricians before contracting. At the moment such a register doesn't exist, and so protection of title would be more difficult to verify. Those administering the scheme need to be disinterested in any aspect of the training or assessment of electricians.

HSE enforcement of the Electricity at Work Regulations 1989 (EAWR) is not pragmatic as a preventative measure in the domestic sector, for resourcing reasons. These regulations, defining the requirements for safety, and fundamental electrician principles, would most likely come into effect in response to a reportable incident or accident. Statutory measures work best with financial sanctions imposed for non-compliance. Conversely protection of title may lead to financial savings eg reduced insurance rates for confirmed membership of a recognised scheme.

5. Would both protection of title and regulation of electrical work be required or would only one be necessary?

The IET believes that both protection and regulation are advisable, given the issues with voluntary approaches. Of the two, we believe that protection of title by those assessed as competent is the most important element. For instance, for electrical installation work, anyone competent will have a working knowledge of BS7671 Wiring Regulations, and have passed various suitable examinations. There may be need for some additional qualifications.

In terms of regulation, a flexible stance is needed to ensure that changing demands / industry standards can be accommodated. BS7671 is a standard ie it is not statutory. This allows control and flexibility, enabling it to be updated quickly and effectively to encompass changing technologies, best practice and safety issues. If these regulations became statutory, more time may be needed to put measures into effect.

6. Where measures, for example relating to consumer protection, could not be put on a legal footing, would this weaken the effectiveness of introducing regulations?

The IET believes that this would weaken the effectiveness of regulations, though lessened if trading without the necessary qualifications were enforced as a specific, indictable offence. The industry

should look to firm up electricians' understanding of and compliance with existing legislation, so as to inspire and influence electricians to offer effective service to consumers.

In the industry, support for the customer seems to be lacking - even in England when the work has been carried out by an electrician who is registered with a Scheme Provider. Many cases of unsatisfactory work are considered as civil matters and end up in the Small Claims Court. If an electrician is registered with a Scheme Provider, both the tradesperson and the Provider should be deemed responsible for defective or non-compliant work. The penalties that can be applied to the registrant should reflect the severity of the issue.

#### 7. How should "electrician" or "electrical work" be defined in any regulations in order to prevent unnecessary restrictions on workers, reflect the current wide variety of activities and take into account possible future development due to advances in technology?

There are many different areas that currently need defining. These may be categorized as to the type of work eg 'domestic / commercial / industrial electrical work', and the level (eg supervisory / apprentice). With technological advances, more categories will be introduced that will require different and cross-cutting skills sets and experience e.g. EV charging installations, prosumer electrical installations that require advanced knowledge and understanding of the distribution code.

The scope of work that a registered electrician is allowed to do should be specified on a 'licence to practice'. This would include knowledge and experience of the electrical work being carried out, an understanding and practical experience of electrical systems, understanding and managing hazards, and a focus on / ability to recognize and manage safety matters.

Technical knowledge and experience should also be reassessed on a regular basis so as to confirm competency at the designated level, so as to ensure safe, effective practice. For example, this could be a 5-day assessment every 5 years. However, before decisions were taken on reassessments, industry costs would need calculating, taking account of factors such as differing skills levels, numbers of practicing electrical workers and the availability of assessors.

#### 8. How would administration and enforcement of regulations be financed?

Given the concerns raised that have resulted in the drive to achieve protected title, it's in the interest of public safety that sufficient funds are allocated to support such industry improvements and to protect the customer. However, it's important that the scheme (registration and maintenance of an online database) is not bureaucratic.

To become registered as a legally licenced electrician you would expect to pay a yearly fee to an association or institution. There could be a levy on such fees to raise funds to support the introduction of protected title. Such a licencing system would be operated in the same way as the Gas Safe Register, with similar requirements to achieve particular levels of competence, and demonstrate maintenance of such levels on a regular basis.

Funding may also be available from the fees raised when electricians become registered and notify local authorities of electrical work that has been carried out in domestic properties.

In addition, a model similar to the HSE Fee For Intervention process could be introduced where inspectors were called in to investigate failures. Such financial penalties would incentivise improvements in practice.

Enforcement would be by the Police as trading as an electrician would become an indictable offence if not qualified and registered.

9. Would introducing new statutory measures help in the enforcing of existing consumer protection and health & safety legislation? If so, would that be a sufficient justification in itself for legislation?

Yes, new statutory measures will help enforce existing legislation, and justify its introduction. With enforcement you get compliance – or deregistration and serious sanctions. Compliance will protect consumers who may not have the knowledge or information to check traders.

To guarantee that work is carried out to the necessary standard demands confirmation that the contracted person has the skills and knowledge to meet the relevant statutory / non- statutory requirements. This reinforces the need for protection of title.

Statutory measures need to be enforced to be effective. Informing local authorities of notifiable electrical work carried out is required. However, there may be many incidents of failed reporting.

The introduction of Part P in England and Wales provides a means of prosecution, although there are many concerns about its appropriateness and effectiveness, as previously mentioned. Part P is an Approved Code of Practice rather than a statutory requirement. It's difficult to prosecute as to be successful you need 'points to prove' beyond all reasonable doubt.

10. How should any new statutory measures interact with existing regulations?

The ultimate aim is for new measures to protect domestic, commercial and industrial consumers. As such, new measures must integrate with BS7671 without ambiguity or contradiction. This requires the close analysis of new and existing regulations by legislative bodies, industry practitioners and professional institutions, such as the [IET](#), to ensure pragmatic, effective and aligned regulations.

11. If regulation is introduced, what should the industry do to support those who will need to upskill to meet the new requirements?

As a matter of urgency and as a minimum, industry should provide support and guidance to stop the decrease of the number of qualified and competent electricians.

The IET has a close working relationship with the two largest awarding organisations (AOs) in the UK and has links with other smaller AOs. Through these AOs we ensure that we provide sufficient training and guidance to the electrical industry. The IET also publishes a quarterly magazine which contains articles on current matters of relevance to the industry. We, at the IET and in particular the Technical Regulations Team, pride ourselves in being in a position to inform the electrical industry. We are seen as the 'go to' body for guidance and clarity on all electrical installation matters.

We would encourage the industry:

- to communicate to practitioners the benefits of professional registration;
- to support individuals in gaining qualifications;
- to provide people with opportunities to gain experience in the workplace, and to refresh skills sets on a regular basis to ensure competent, safe practice.

Protection of title and regulation would greatly enhance this message and would help to drive out rogue traders.

## 12. What actions will be most effective in raising standards and increasing consumer protection?

12.1. More info: This question relates to increasing consumer awareness and protecting consumers.

The key point is that electricians are well trained and up to date with regulations. As mentioned in the response to Q8, practices in the electrical industry should mirror those in the gas industry, and include an equivalent to the Gas Safe register across the 4 UK nations (given multiple registration and rule issues affecting electricians crossing borders for work). Such a register should be publicized widely and made available free of charge. This would encourage the public to check that an electrician has relevant qualifications and related experience before contracting work.

The change to the reserved title will need some publicity, similar to that when Gas Safe was instituted. Electricians will need to be aware of the new offence via the trade press. There will need to be a short transition period whilst registration and training are completed, say 12 months.

Co-ordinated, timely and targeted public information campaigns, across traditional and social media, should be run by the Scottish Government and local authorities to raise awareness of the importance of using suitably skilled electricians, and the dangers from not doing so. This requires clear and concise information in accessible language with practical examples of the types of work an electrician is / isn't qualified to do with particular qualifications.

In addition, information should include ways in which consumers can seek advice and provide recourse to compensation or other remedies for sub-standard and non-compliant work. Insurance companies may have influence here. They may require proof that work has been carried out by competent persons before paying out for damage.

## 13. Are there any actions not listed that are necessary to increase consumer awareness?

13.1. More info: The actions listed in the consultation document are:

13.1.1. development of a single, easily identifiable means for consumers to use, to determine if an electrician has been assessed as qualified or competent;

13.1.2. establishment of a public education campaign on hiring electricians safely, with buy-in from industry bodies and consumer organisations.

As per our response to Q12, the IET agrees with both suggested means of increasing consumer awareness, namely the development of a single means for consumers to determine electrician competence, and a public education campaign. Both are essential for enhancing consumer protection.

## 14. How can any new actions be used to build on and supplement the existing system?

14.1. More info: This question relates to increasing consumer awareness and protecting consumers.

The points mentioned in previous responses cover this question. The key points are public awareness and education, mandatory professional registration, an accessible register of competent users, more stringent requirements for Scheme Providers, more severe penalties for poor / non-compliant work and better, more rigorous assessment procedures for domestic installers.

Protection of title at different levels and regulation will greatly enhance the effectiveness of measures put in place to protect consumers. The existing system is not fit for purpose. The industry must consider safety over financial opportunity.