

Structuring Investor Ready Energy Efficiency Projects

Jorge Rodrigues de Almeida

Bucharest, 1 February 2018



In 2016, global energy-efficiency investment rose 9% to

 **\$231** billion

To achieve “66% 2°C” scenario
requires *average* investment into
energy efficiency > USD 1 trillion a
year between 2016 and 2050

i.e. circa 5 x current level

We need to build the jigsaw of energy efficiency finance





Lack of standardization is a problem

Lack of standardization (in project development and documentation) is one of the major barriers to increasing investment into energy efficiency

Energy Efficiency – the first fuel for Europe



Energy efficiency projects do not yet meet the requirements of capital markets. No two projects or contracts are alike.

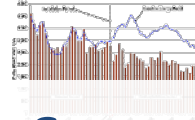
Michael Eckhart, MD & Global head of Sustainable Finance



Standards are like DNA. They are the basic building blocks for all technology and economic systems.

D.E. Purcell

Lack of standardization is a problem



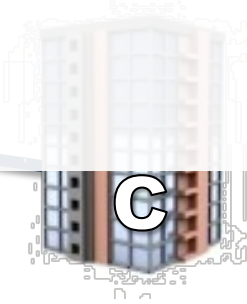
Greater performance risk

Uncertainty limiting demand

Higher transaction costs

Difficult to build capacity

Difficult to aggregate



An international framework for reducing owner and investor risk, lowering due diligence costs, increasing certainty of savings achievement and enabling aggregation.



Ensures transparency, consistency and trustworthiness through **best practice and independent verification.**

The Investor Ready Energy Efficiency™ Certification

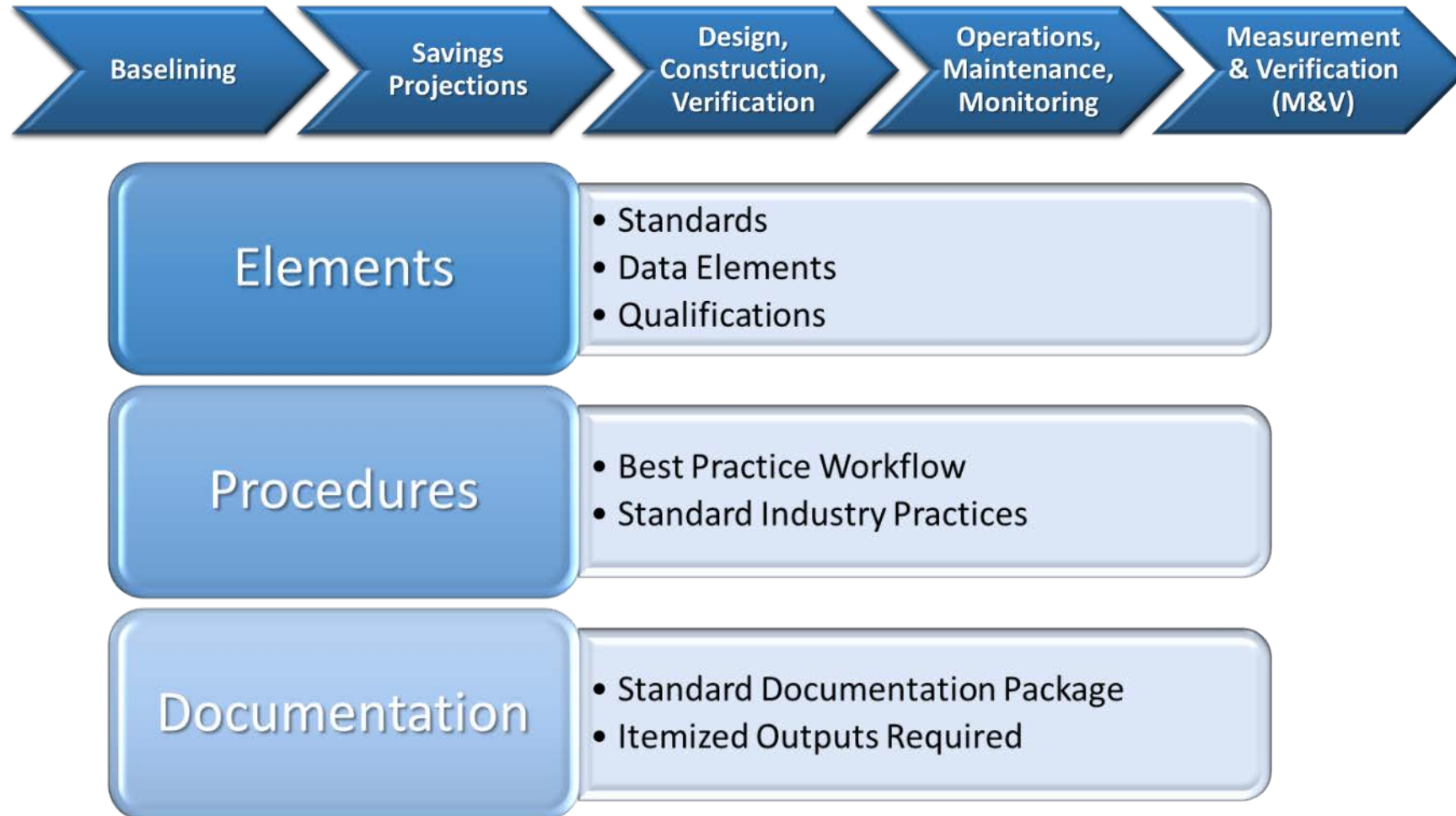


IREE™ is the quality mark like BREEAM or LEED but for a **BUILDING, DISTRICT ENERGY, INDUSTRY OR STREET LIGHTING EFFICIENCY PROJECT**

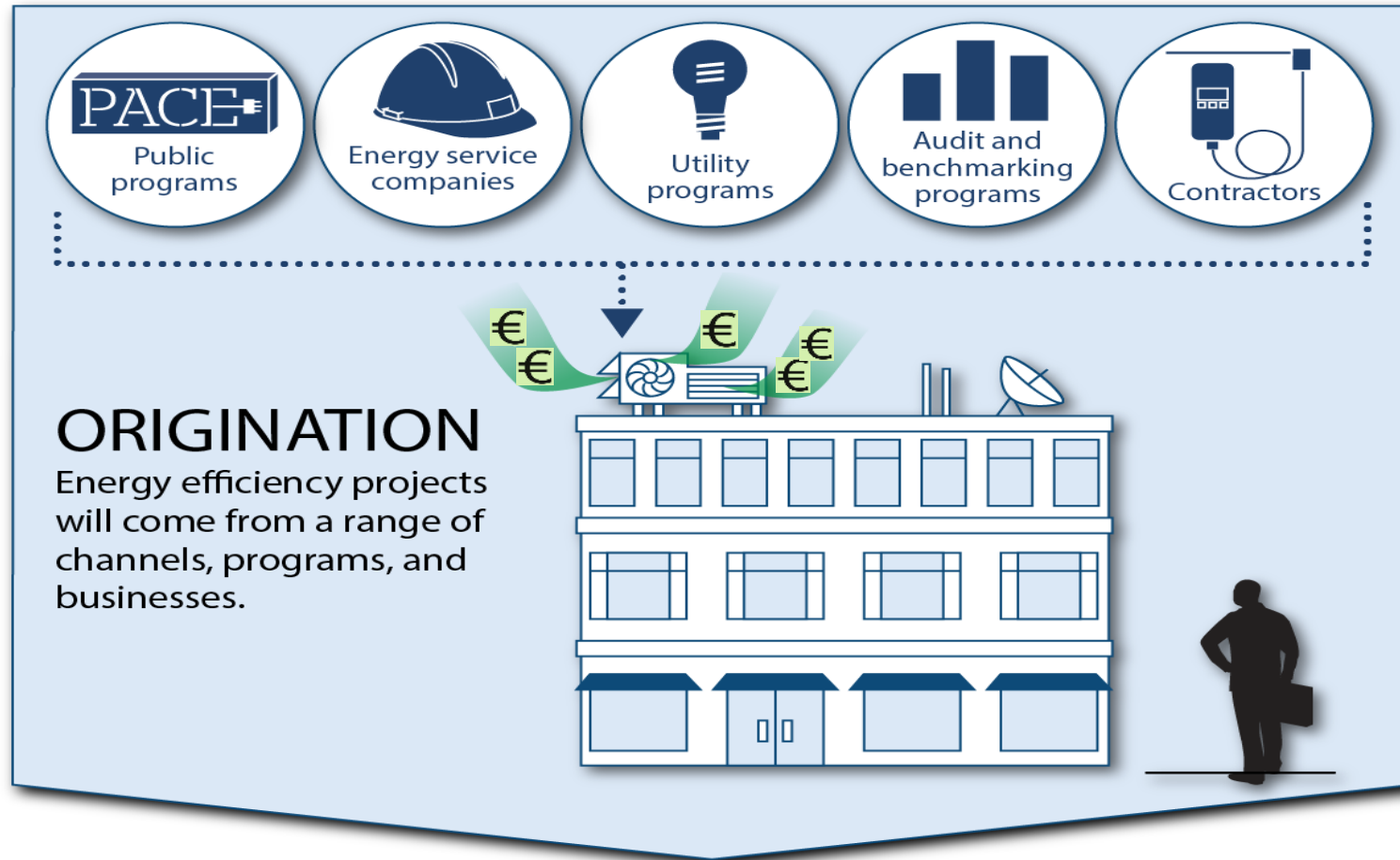


IREE™ can be used with any energy efficiency project performance indicator – it is certifying individual energy efficiency projects

What is the content of the IREE™ Certification?



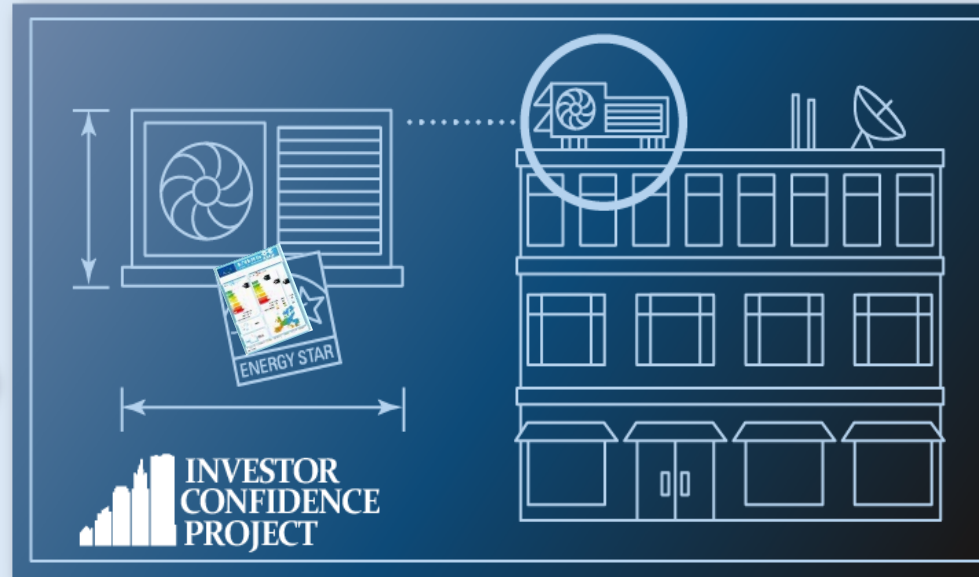
The process of IREE™ Certification



The process of IREE™ Certification

PROJECT DEVELOPMENT

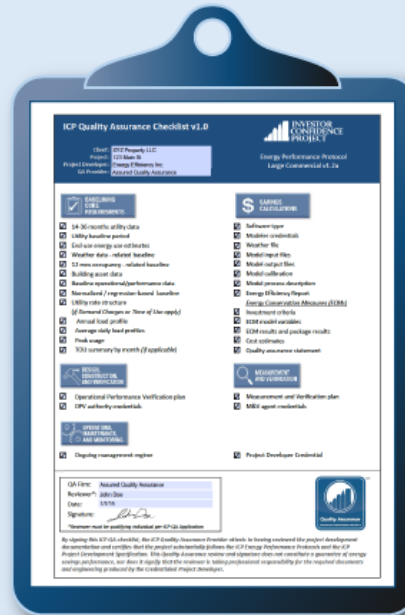
Credentialed Project Developer develops and documents projects according to ICP Protocols.



The process of IREE™ Certification

CERTIFICATION

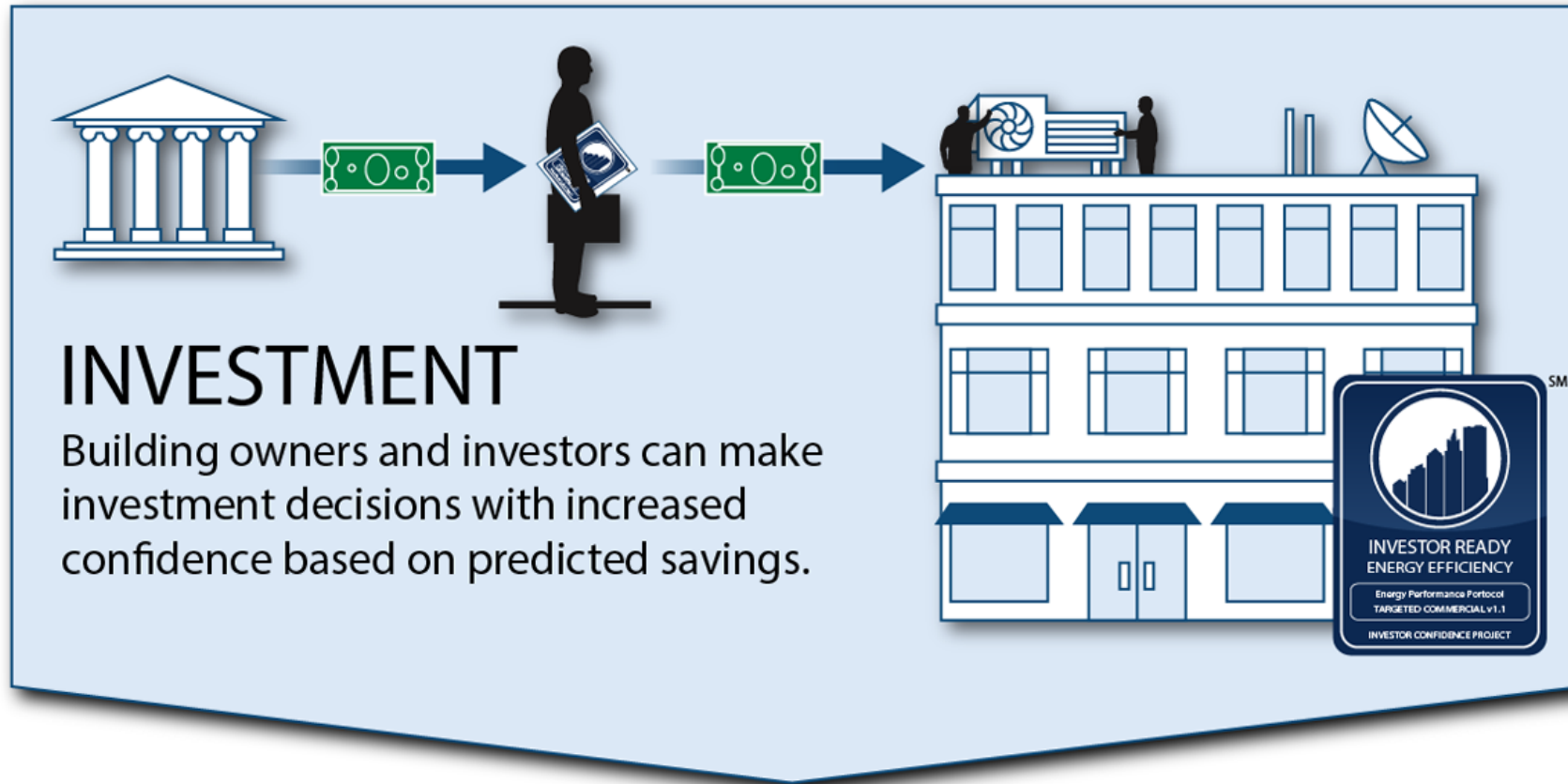
Independent Credentialed Quality Assurance Provider reviews project for ICP compliance and certifies qualifying projects as Investor Ready Energy Efficiency™.



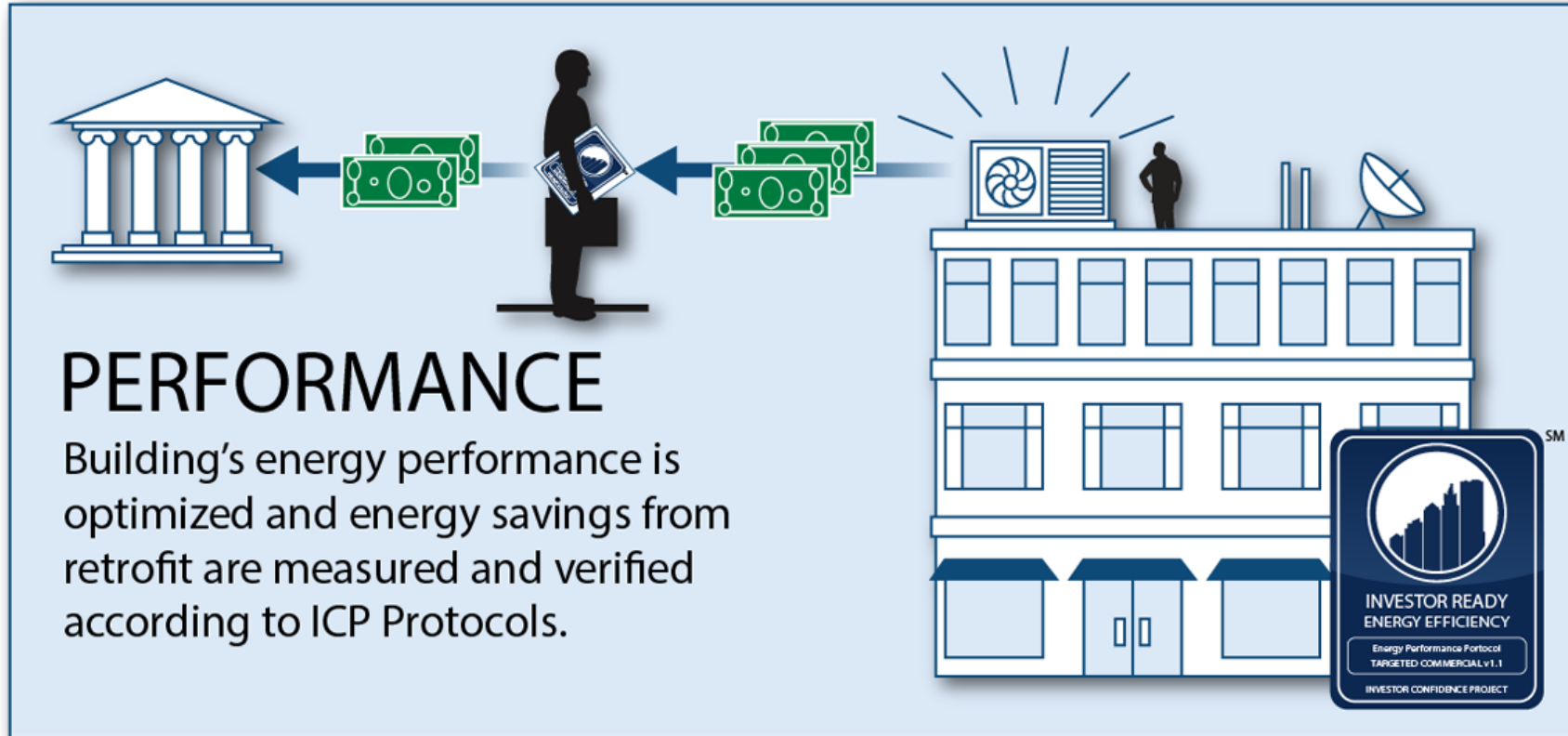
The image shows a clipboard with a checklist titled "ICP Quality Assurance Checklist v1.0". The checklist is organized into several sections with checkboxes. The "EXCLUSIONS" section includes items like "14-30 months of utility data" and "Utility baseline period". The "LOADS" section includes "Software type" and "Weather station". The "METERING AND VERIFICATION" section includes "Measurement and verification plan" and "MVI agent installation". At the bottom, there is a signature line for the QA Firm, "Assured Quality Assurance", with a date of "N/A" and a signature.



The process of IREE™ Certification



The process of IREE™ Certification



What project types is IREE™ designed for?



Buildings



Industry

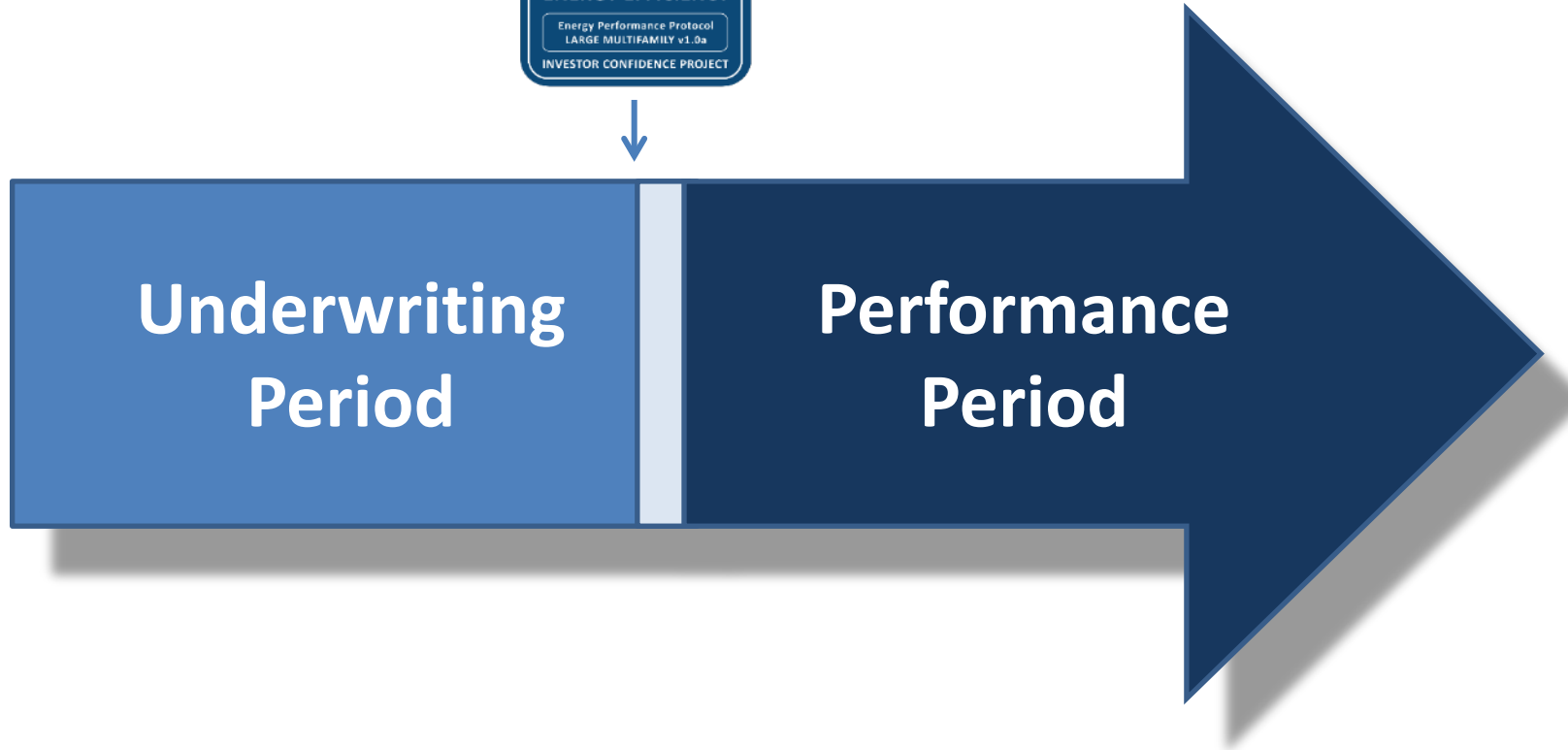


District energy systems



Street lighting upgrades

The IREE™ Certification is delivered prior to investment decision



Benefits: Project owners

IREE's **independent review and certification** of proposed projects:

- Gives owners **confidence in project development and savings achievement.**
- Enables the **comparison of projects** and access to more **project investment.**
- Can function as a “**Tender in a box**” and **underwriting criteria** for buildings and portfolios.



Benefits: Investors

- IREE **reduces due diligence costs** and **speeds underwriting**.
- opens **access to quality projects** through Credentialed Project Developers
- increases **confidence in project fundamentals and engineering**.
- Standard projects and document packs with third party allows for the **aggregation of projects** across borders and programmes.



Benefits: Project developers

- Offers a **repeatable project process**, aiding Quality Assurance
- Enables **more project approvals** due to industry standards and 3rd party review
- **Differentiates your company** and increases credibility with customers
- Increases ability to **connect with finance**, insurance, utility programmes, without additional transaction costs



Benefits: Government programmes

- Investor Ready Energy Efficiency™ is based on internationally recognized and off-the-shelf technical standards **ready to deploy.**
- Ready made provider **credentialing and training programme.**
- Allows for the ability to distribute Quality Assurance **costs to the market.**



ICP Investor Network

ICP Investor Network represents €1.5 billion in energy efficiency project capital. They are looking for quality projects built to IREE™ standards and some provide incentives for IREE projects.



INGENIOUS INFRASTRUCTURE

DARITY



Menhaden



Certified Projects

- 3 hospitals in Liverpool, UK
- Commercial office in London, UK
- Commercial office in Portugal
- Private secondary school, UK
- Leisure centre, UK



Three NHS trusts to save half of energy expenditure with 'landmark', industry-first funding grant

By Liam Stoker 11 Jul 2016, 16:02



Three NHS trusts in Liverpool are to benefit from the first Investor Ready Energy Efficiency-certified funds, and save nearly £2 million each year.

Aintree University Hospital NHS Foundation, Liverpool Women's NHS Foundation Trust and The Walton Centre NHS Foundation Trust will receive £13 million in funding under the Environmental Defense Fund's Investor Confidence Project.

That funding, developed by the Carbon and Energy Fund and financed by Macquarie Group, will pay for various energy and carbon saving initiatives which are intended to cut the three trusts' energy consumption by 50%.

Lessons learnt from pilot projects

- Wide variation in savings calculations
- Early engagement is important
- Additional effort can be minimal
- Committed contract price is typically final piece of jigsaw
- Consistent document management is key



How Can We Help You?

- We can **certify** your project
- We can **connect** you with investors
- We can **connect** you with industry-leading project developers
- We can help you **make your city/regional/national programme more attractive** to investors
- We can **train** and credential you which will enable you to stand out in your industry
- We can add you to our **Ally Network**

Contact

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The ICPEU and I3CP projects have received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 649836 and 754056. The sole responsibility for the content of this document lies with the authors. It does not necessarily reflect the opinion of the European Union. Neither the EASME nor the European Commission are responsible for any use that may be made of the information contained therein.



Climate change is a major threat to development with economic, health and safety, food production, security and other dimensions.

Scientists confirm unequivocally global warming and that **humans** are causing most of it through activities that **increase concentrations of greenhouse gases**, such as deforestation and burning fossil fuels. Major changes are being observed.

RdA – Climate Solutions believes that the most dangerous climate changes may still be avoided but immediate **global action** is needed to slow the growth in greenhouse gas emissions and to adapt to changes that are already locked in.

RdA is an advisory company specialized in mitigation and adaptation strategies. Our team includes world-class experts in climate change, energy efficiency and sustainable finance.

Key areas:

- Low-carbon and climate resilient cities;
- Energy efficiency and renewable energy;
- Sustainable finance.