

Embracing SS 673 for a Sustainable Future

The global corporate shift towards sustainability has intensified the demand for the efficient and transparent management of renewable energy. Ensuring the accountability and credibility of Renewable Energy Certificates (RECs) encourages businesses to adopt them by providing verifiable evidence of sustainability efforts through their renewable energy consumption. This increased adoption of RECs strengthens market demand, catalyses investment in renewable energy projects, and improves their economic feasibility, ultimately accelerating the transition to a low-carbon economy. These efforts align with Singapore's commitment under the Paris Agreement to reduce emissions intensity by 36% from 2005 levels by 2030 and achieve net zero emissions by 2050.

However, inadequate management of renewable energy systems and RECs can expose organisations to multiple risks, including regulatory non-compliance from incorrect reporting, reputational damage from unverifiable claims, allegations of greenwashing, and increased costs from operational inefficiencies.

To mitigate these risks, SS 673:2021 *Code of Practice for Renewable Energy Certificates*, developed by the Working Group on Renewable Energy Certificates, which was set up by the Technical Committee on Energy under the purview of the Environment and Resources Standards Committee, establishes a comprehensive framework that governs the entire life cycle of RECs, ensuring traceability and accountability while aligning with international best practices.

Objectives of SS 673

SS 673 is designed to enhance the integrity of measuring, reporting, and verification (MRV) processes related to renewable energy use. It establishes comprehensive guidelines for REC management, which comprises:

- Defining eligible renewable energy sources and the roles of stakeholders within the REC ecosystem

- Setting up robust frameworks for registering and verifying renewable energy installations
- Standardising procedures for issuing, transferring, and retiring RECs
- Specifying public reporting requirements for renewable energy installations and REC transactions
- Recommending best practices for leveraging RECs to substantiate renewable energy claims

By adopting SS 673, organisations have a structured approach to validate their renewable energy claims through robust governance frameworks, clearly defined policies, and standardised processes for REC management. In addition, following the standard's detailed requirements on REC documentation, verification, and trading processes would help organisations maintain accurate records and make credible renewable energy claims, while preventing double-counting and misreporting.

General Benefits of Adopting SS 673

The adoption of SS 673 offers businesses several significant advantages:

1. Enhanced REC Management

The standard promotes transparency and accountability, allowing organisations to streamline their management of renewable energy claims.

2. Supports Clean Energy and Lowers Carbon Footprint

By adopting SS 673, organisations can support the growth of clean energy initiatives through active participation in the renewable energy market and reduce their carbon footprint, helping to promote a more sustainable future.

3. Operational Efficiency

Standardised workflows reduce risks and improve overall efficiency.

4. Public Perception

Adopting SS 673 showcases an organisation's commitment to environmental stewardship, enhancing its reputation among stakeholders.

Schneider Electric

A CASE STUDY

Schneider Electric, a global leader in energy management and digital automation, exemplifies the transformative potential of SS 673. Operating in over 100 countries, including Singapore, the company reported revenues of €36 billion in 2023. Sustainability is embedded in its operations through the Schneider Sustainability Impact (SSI) programme, which aligns with the UN Sustainable Development Goals (SDGs). Recognised for environmental leadership, Schneider Electric has been on the Carbon Disclosure Project's Climate Change A List for ten consecutive years.



Schneider Electric transformed an industrial site into a carbon-neutral office with 180 solar panels and 5,000 IoT points.



STAFF STRENGTH
115 (Singapore office)

INDUSTRY
Transmission, distribution, and sale of electricity

CORE ACTIVITY
Digital automation and energy management

Schneider Electric and industry leaders united at Jurong Island to advance workplace safety and sustainability in petrochemicals.

Challenges Faced and Motivations for Adopting SS 673

Schneider Electric faced challenges in managing RECs efficiently and transparently, including:

- A lack of standardised procedures for REC management in the ASEAN region
- Limited recognition of RECs by international agencies
- Difficulty aligning REC practices with carbon taxation policies

These challenges underscored the need for a robust framework to support its renewable energy goals.

In June 2023, Schneider Electric partnered with Flo Energy Singapore to adopt SS 673 for its emphasis on consistency, transparency, and alignment with global standards.

Tangible Benefits of Implementation

Since implementing SS 673, Schneider Electric has achieved several measurable benefits:

1. Streamlined Efficiency

Standardised workflows have reduced processing times by 15%, eliminating duplication and enhancing productivity while achieving cost savings.

2. Enhanced Control

Adoption of the standard's monitoring protocols has improved operational quality and consistency.

3. Alignment with Global Standards

SS 673's compatibility with international standards has simplified cross-regional operations and facilitated global integration.

4. Enhanced REC Traceability

The company uses SS 673's guidance to prevent double-counting, enhance REC traceability, and ensure accurate energy reporting through digital power monitoring systems. For example, Schneider Electric tracks RECs quarterly based on actual consumption, using digital power meters and Power Monitoring Expert technology to cross-check monthly bills. Internal policies define roles for compliance, while regular internal and external audits assess adherence.

5. Green Building Certification

Purchase of RECs generated in accordance with SS 673 standards supported Schneider Electric in attaining the Building and Construction Authority (BCA) Green Mark: 2021 In Operation Platinum Zero Energy Certification.

Looking Ahead

Schneider Electric's journey to leverage SS 673's benefits is ongoing. The company plans to deepen its use of RECs as part of its overarching goal to achieve net-zero emissions by 2030. Its adoption of SS 673 demonstrates the transformative potential of clear standards and guidelines in advancing sustainability goals.

Advice for Organisations Considering SS 673

Drawing from its experience, Schneider Electric offers the following practical advice to organisations exploring the adoption of SS 673:

1. Understand the Standard

Review the scope, objectives, and relevance of SS 673 to ensure alignment with organisational goals.

2. Secure Leadership Buy-In

Engage senior leadership by highlighting the potential benefits, such as improved efficiency, reduced costs, and enhanced market access.

3. Leverage Partnerships

Collaborate with experienced partners for a smooth implementation process.

By embracing SS 673, organisations can strengthen their REC management practices and validate their renewable energy claims, while demonstrating a firm commitment to sustainability.

Conclusion

Schneider Electric's adoption of SS 673 serves as an inspiring example of how businesses can overcome challenges in REC management, unlock operational efficiencies, and contribute to global sustainability efforts. This case underscores the importance of robust standards in driving environmental and operational excellence, paving the way for a sustainable future.