### **SOLAR** PRO. Italian energy storage pilot

How big is Italy's energy storage sector?

However, permitting bottlenecks remain a key concern. Figures by industry group Italia Solare put the current size of the Italian energy storage sector at approximately 450MWof total installed capacity.

Can Italy make battery storage projects commercially attractive?

"Italy has a clear need for storage, and the enabling market and regulatory mechanisms are being put in place to make battery storage projects commercially attractive." CIP's Flagship Fund CI V, completed in March 2025, exceeded its EUR12bn (\$12.9bn) target.

What drives growth in Italy's energy storage sector?

LONDON (ICIS)-Market actors predict growth in the Italian energy storage sector will be driven by the system balancing needs of the grid operator in the face of increasing renewable penetration and conventional plant closures. However, permitting bottlenecks remain a key concern.

Who has the largest battery storage capacity in Italy?

With 60MW, Enel-Xclaimed the largest awarded capacity in the first pilot tender followed by French utility Engie with 44MW, Metka Egri Apulia with 26MW and Iren with 25.5MW. Market participants have identified permitting issues as the main obstacle to greater growth in Italy's battery storage sector.

How much solar storage will Italy need by 2025?

Italian transmission system operator (TSO) Terna said that 1GWof storage linked to solar farms will be needed by 2025 to help maintain system adequacy, with additional 6GW of utility-scale storage needed by 2030. The majority of revenue for storage assets comes from participation in Terna's fast reserve scheme.

Why is CIP launching large-scale battery projects in Italy?

The development of large-scale battery projects aligns with CIP's growing focus on energy storage. With Italy's supportive regulatory environment, the partnership aims to leverage CIP's expertise to advance its storage infrastructure projects. The move also supports Italy's aim to meet the nation's 2030 renewable energy targets.

The US Department of Energy's (DOE) Office of Clean Energy Demonstrations (OCED) has issued a Notice of Intent (NOI) to fund pilot-scale energy storage demonstration projects, focusing on non ...

Minister of the environment and energy security Gilberto Pichetto has signed a decree allowing Italy to proceed with its energy storage capacity auction, known as MACSE, in the first half of 2025. ... Startup XL Batteries ...

The Italian energy storage market is pivoting towards the utility-scale segment significantly, evident from the recent investment trends. ... E-Distribuzione was in the process of executing a pilot on the flexibility market

#### **SOLAR** Pro.

### Italian energy storage pilot

(in partnership with platform provider Piclo) to test ancillary service procurement (Smart Energy, 2023).

Italy; USA; Mexico; Latin America; ... construction, erection, testing and commissioning of the thermal energy storage system pilot plant of around 200 MWh (thermal) capacity integrated with the Steam and feed water cycle of the thermal power unit to generate additional net electrical power of 15 MW for four hours. Operations and maintenance ...

Italy grid operator TERNA to pilot 230MW grid-balancing opportunity. TERNA, operator of Italy"'s electricity transmission system, is set to open up a pilot scheme in which up to 230MW of aggregated nominal capacity including energy storage could supply frequency and voltage services to the grid.

To stay in line with EU 2030 climate and clean energy targets, TERNA said, Italy"s National Energy and Climate Plan (NECP) foresees an increase of renewable energy capacity on the grid to 40GW by 2030, with ...

pilot test for study or research purposes; it is a market initiative aimed at enabling the decarbonisation of the Italian electricity system by deploying large volumes of storage capacity. ... output (power-related CAPEX), the second as a function of the energy storage volume (energy-related CAPEX). In this respect, lithium-ion batteries differ ...

With the launch of their commercial demonstration facility in Sardinia, Italy, Energy Dome's energy storage technology is ready for market. MILAN (June 8, 2022) - Energy Dome, a leading provider of utility-scale long ...

The Italian energy and gas regulator AEEGSI has issued the deliberation 300/2017/R/EEL with which it authorizes pilot renewable energy power generators and storage units to participate to the ...

Last week, UK battery storage developer Field announced it would enter Italy, while Innovo Group and Aquila Capital made similar moves last year. The residential energy storage market in Italy is already very strong, with the ...

BESS technology has won the bulk of new resource contracts in the capacity market (CM) auction for delivery in 2027 in Italy. The auction took place last week (26/27 ...

The development of large-scale battery projects aligns with CIP's growing focus on energy storage. With Italy's supportive regulatory environment, the partnership aims to ...

battery storage projects in Italy. He says the recognition that storage is needed to integrate Italy"s big renewa-bles pipeline has combined with a capital market which is now more comfortable with and willing to invest in energy storage. "In Italy, through our JV with Iberdrola we have an indicative target of 1GW for 6 hours (duration).

### **SOLAR** PRO. Italian energy storage pilot

The paper describes the legislative and regulatory framework underlying the experimental pilot projects carried out by the Italian TSO TERNA concerning Battery Energy Storage Systems for ...

Engie has signed an "energy storage as a service" contract with technology provider Energy Dome for a long-duration energy storage (LDES) project in Sardinia, Italy. The French multinational utility and the Italian startup ...

Cubico Sustainable Investments has formed a joint venture (JV) with a local developer in Italy to develop 1GW-plus of battery energy storage system (BESS) projects.

A year and a half ago, Energy Dome wasn"t even a company. Now, it so built a 2.5-megawatt, 4 MWh pilot renewable energy storage system based on a fascinating CO2 battery technology that promises to ...

In 2024, Italy"s energy storage market saw remarkable progress, with a 24.6% rise in the number of storage systems and a 30.4% increase in total rated power, reflecting the growth of larger, more efficient installations. To maintain grid ...

The panel discussion on Day 1 of the Energy Storage Summit EU in London last week. Image: Solar Media. Italy"s grid-scale energy storage market opportunities are unlike anywhere else, but many challenges and uncertainties ...

The engineering team guided by Mr. Claudio Spadacini, founder and CEO of Energy Dome is building a 2.5MW/4MWh first of a kind energy storage facility in Sardinia, Italy, expected to be launched in early 2022. The plant, with a size of ...

Storage in Italy: Terna o Around Euro 200 mln invested (Regulatory Asset Base -RAB) o Storage pilot projects - Terna spa 9 o Main target: contribution to grid security o Size ...

The two parties will establish a PV distribution and storage pilot project in Italy in the near future, which will use CORNEX M5, CORNEX"s self-developed and self-produced 20-foot pre-fabricated cabin with 5MWh batteries. In the long term, the two sides are expected to realise cooperation on 20GWh-30GWh of energy storage projects within 3-5 years.

Gestore Servizio Energetici ("GSE") is the state-owned company which promotes and supports renewable energy in Italy. In particular, GSE fosters sustainable development by providing support for renewable electricity generation and renewable energy storage, and by taking actions to build awareness of environmentally-efficient energy uses.

Terna has invested in a new pilot project for an ancillary service (230MW of total capacity), called Fast Frequency Reserve, that can reply to the grid frequency drops in few seconds, ...

**SOLAR** Pro.

Italian energy storage pilot

"Italy is one of the most exciting markets for battery investors. It provides a route into battery energy storage systems (BESS) for a lot of capital that is pretty excluded from other markets," said Timera"s Steven Coppack, director for power market services. Coppack will speaking on Day Two of next week"s Energy Storage Summit 2025 in ...

Italy"s transmission system operator Terna has awarded five-year contracts for battery energy storage systems (BESS) to provide Fast Reserve grid services in an oversubscribed pilot auction. After Terna rolled out its plans for ...

A number of pilot projects have also helped begin a wave of investment in ... "This can be "the trick" that can push the development of storage [in Italy]," Giorgio Perico from REF-E said. Italy"s National Energy and Climate ...

The companies revealed the deal in an Italian stock exchange announcement this morning (11 January), though it did not provide much detail about the acquired project, which would be one of the largest projects in the ...

NSP expects the long-duration energy storage pilot project will be operating by the end of 2025 and will be paired with up to 710 MW of solar at the site of a coal-fired power plant that is being ...

The two parties will establish a PV distribution and storage pilot project in Italy in the near future, which will use CORNEX M5, CORNEX's self-developed and self-produced 20 ...

managed by the Italian Energy Market Operator (GME), involving Terna and operators interested in utilizing storage capacity, but not directly the managers of the storage systems themselves, who are simply obligated to make their capacity available. Specifically: - GME manages the market platform for purchasing such products

The firm has been an early mover in Italy"s grid-scale energy storage market with over 1GW of BESS under construction after big capacity market wins in 2022. In concurrent news, developer Emeren has continued its

Web: https://www.eastcoastpower.co.za

## Italian energy storage pilot

# **Commercial and Industrial ESS**

Air Cooling / Liquid Cooling

- Budget Friendly Solution
- Renewable Energy Integration
- Modular Design for Flexible Expansion

