



# Powerwall Energy Storage Explained

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### Why Modern Homes Struggle with Energy

Ever noticed how your electricity bill keeps climbing despite using LED bulbs and smart thermostats? You're not alone. The U.S. Energy Information Administration reports residential electricity prices jumped 28% between 2010-2022. But here's the kicker - most homes waste 35% of the power they draw from the grid.

Three main culprits fuel this energy crisis:

- Spiking demand from electric vehicles and smart home devices
- Aging grid infrastructure prone to outages (remember the Texas freeze of 2023?)
- Solar panel owners losing unused energy back to utilities

### How Powerwall Systems Fix Energy Woes

This is where Highjoule Technologies' Athena Home Battery steps in. Our 14.4kWh lithium ferrophosphate system stores excess solar energy or cheap off-peak grid power. during California's rolling blackouts last summer, the Martinez family in San Jose kept their medical equipment running for 72 hours straight using just our battery and 8 solar panels.

"The system paid for itself during the first major outage," says Linda Martinez. "We've reduced our annual energy costs by \$2,300."

### The Numbers Don't Lie

- FeatureStandard GridAthena System
- Outage Protection0 hours18-36 hours
- Energy Waste32% average



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