INDI ENERGY: VANGUARD OF INNOVATION & SUSTAINABILITY

- Fully Integrated Pilot Facility for Sodium-ion Batteries and Components
 - Multiple Patents filed and granted

Recognized Leader in numerous National Sustainable Energy Storage Competitions & Expos







CONTACT INFORMATION

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India's 1st company to successfully develop **Sodium-ion Batteries**



Empowering a Sustainable Future for All





Indi Energy, a DRDO Dare to Dream 3.0 and National Startup Award winner, is an energy storage startup from India involved in the development and commercialization of Sodium-ion batteries and their components like **Hard Carbon (BioBlack™), Sodium-ion cathode, Sodium-ion electrolyte**, etc. Fabricated at our state-of-the-art facilities in Roorkee, India, Sodium-ion batteries from Indi Energy are cost-effective and in line with the **UN Sustainable Development Goals**.

As an alternative to lithium-ion batteries and lead-acid batteries, Indi Energy's Sodiumion batteries are safer and more sustainable and will indeed prove themselves to be a 'Common Man's Battery'!

VISION

Indi Energy's vision is to empower the world to become a self-sufficient and sustainable green economy by developing and commercializing indigenous and environmentally friendly energy storage technologies.

MISSION

Indi Energy's mission is to support the world's gradual transition from a fossil-based economy to a clean energy economy by providing low-cost, high-performance battery technologies for industrial and consumer applications made from locally sourced abundant materials like agricultural waste/biowaste to build a self-sustaining circular economy.

Our Products

HARD CARBON (BIOBLACK™)

Indi Energy's proprietary Hard Carbon ($BioBlack^{m}$) is derived from unutilized and abundant agricultural/bio-waste and is recognized as a promising anode material with outstanding electrochemical performance for Sodium-ion Batteries (SIBS).

Technical Specifications –

- Reversible Capacity (up to 1.0 V): 300 (+-5) mAh/g
- Plateau Capacity (up to 0.2 V).: 220 (+-5) mAh/g
- Average Interlayer Spacing d002: 0.38 nm
- Particle size (D50): ~25 um
- Specific Surface Area: <5 m2/g
- Application: Anode material for Sodium-ion batteries

Key Features

- Excellent Performance
- Wide availability
- Low-cost
- Sustainable



SODIUM-ION CATHODE

Indi Energy's Sodium-ion Cathode offers several key advantages.

Key Features

- Long Cycle life
- High Rate Capable
- Zero Strain Charging/ discharging
- Overcharge Tolerant
- Short Circuit Tolerant
- Environment-friendly
- Higher Safety

Technical Specifications

- Reversible capacity: 110-160 mAh/g
 - Average Voltage: 3.0-3.8 V

SODIUM-ION BATTERIES

Indi Energy proudly stands as India's first company to successfully develop the Sodium-ion cell. Building on this milestone, we have further propelled our progress to become the foremost indigenous producers of Sodium-ion batteries.

Technical Specifications

- Working voltage: 3.2-3.8 V
- Gravimetric Energy Density: 130- 160 Wh/kg
- Cycle life>2000 cycles

Key Features

• Sustainable

- Safer
- Less Expensive
 Longer Lifespan
- Non-flammable
- Easy to Recycle



