

Silicon Dreams: SEMICON India 2026

1. SEMICON India 2026 - Why in News?

- **17 September 2026:** Prime Minister Narendra Modi will inaugurate **SEMICON India 2026** at Yashobhoomi, Dwarka.
- **Theme:** *"Silicon to Systems: Building the Ecosystem."*
- The event highlights India's transition from **electronics manufacturing to semiconductor manufacturing**.

2. Why are Semiconductors Strategic?

- Semiconductors are the **foundation of modern electronics**, powering:
 - Smartphones and automobiles
 - Drones and aircraft
 - Healthcare and MRI equipment
 - Satellites and defence systems

The COVID-19 chip shortage demonstrated the vulnerability created by **concentrated global** semiconductor supply chains.

3. India's Electronics Manufacturing Transformation

Indicator	2014-15	2025-26
Electronics production	₹1.9 lakh crore	₹13.11 lakh crore
Electronics exports	₹38,000 crore	₹4.24 lakh crore
Mobile production	₹18,000 crore	₹6.27 lakh crore
Mobile exports	₹1,500 crore	₹2.59 lakh crore

- India now manufactures **99.2% of the mobile phones it uses**.
- Smartphones became India's **largest exported commodity** in FY 2025-26.
- Electronics manufacturing supports around **2.5 million jobs**.
- India is now the **world's second-largest mobile phone manufacturer by volume**.

4. Semicon India Programme

Semicon 1.0 - 2021

- Outlay: **₹76,000 crore**
- Covers the semiconductor value chain:
Design → Fabrication → Packaging → Testing → Equipment → Materials → Talent

Semicon 2.0 - July 2026

- Outlay: **₹1,27,500 crore**
- Six pillars:
 1. Chip design
 2. Semiconductor equipment & materials
 3. Fabrication facilities
 4. Advanced packaging
 5. R&D
 6. Talent development

5. Semiconductor Projects on the Ground

- **12 projects** approved across **6 states**.
- Investment commitments exceed **₹1.64 lakh crore**.
- Projects cover silicon and compound-semiconductor fabs, display fabrication and advanced packaging.
- **3 facilities** have started commercial production.

6. Building Semiconductor Talent

- Target: **85,000 skilled semiconductor engineers** within this decade.
- Chips to Startup (C2S):
 - EDA tools deployed in **320 institutions**.
 - **68,000+** students trained.
- **24 chip-design projects** approved.
- **105 startups/MSMEs** received EDA-tool support.
- By April 2026:
 - **211 chips** taped out
 - Developed by **75 institutions**
 - 7 chips fabricated, including nodes down to **12 nm**.

7. ChipIN Centre - Democratizing Chip Design

- Established at **C-DAC** under C2S and DLI initiatives.
- Provides shared access to:
 - Advanced chip-design tools
 - Fabrication services
 - Specialised training
- Reached **1 lakh+ engineers** from **500+ organisations**.
- Includes **400 academic institutions** and **100 start-ups**.
- More than **300 chip designs** developed.
- Over **4 crore hours** of chip-design tool usage recorded.

8. Global Semiconductor Partnerships

- India joined the **Pax Silica coalition** in 2026.
- Focus: securing the global **“silicon stack”**—from critical minerals and fabrication to AI systems and infrastructure.
- Reflects India's growing role in **global semiconductor supply-chain resilience**.

9. SEMICON India 2026 - Scale

- **600+ exhibitors**
- **300 international companies**
- **15,000 sq. metres** exhibition space
- **150+ speakers**
- **6 country pavilions**
- **12 state pavilions**
- Startup showcase, student hackathon, workforce-development pavilion and Women Forum.

Reference

[PIB](#)

