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2. India's Defence Self-Reliance Push – Defence

The Defence Minister of India emphasized that nations capable of manufacturing their own weapons shape their own destiny during the inauguration of NIBE Group's Defence Manufacturing Complex at Shirdi in Maharashtra. This statement reflects India's growing commitment to achieving self-reliance in defense production, moving away from decades of import dependence. The event showcased India's expanding capabilities in indigenous defense technology and marked a significant milestone in the country's journey toward becoming a global defense manufacturing hub.

1.Key Highlights of the Event

Defence Manufacturing Complex

1. The newly inaugurated facility will manufacture advanced artillery systems, missile and space technologies, rocket systems, energetic materials, and autonomous defense platforms.
2. This complex represents a significant private sector investment in India's defense manufacturing ecosystem, aligning with the government's vision of Atmanirbhar Bharat in defense.
3. The facility is expected to create substantial employment opportunities and contribute to the development of ancillary industries in the region.

Suryastra Rocket System

1. India's first 300-kilometer Universal Rocket Launching System, named Suryastra, was flagged off during the event, marking a major technological achievement.
2. The foundation stone for a dedicated missile complex related to the Suryastra system was also laid, indicating long-term planning for advanced missile technology development.
3. This system represents India's growing capabilities in developing long-range precision strike weapons entirely through indigenous efforts.

Indigenous Technologies Unveiled

1. Indigenous TNT Plant Technology was unveiled during the ceremony, reducing dependence on imports for this critical explosive material used in munitions.
2. Indigenous RDX Plant Technology was also introduced, enhancing India's self-sufficiency in high-explosive materials essential for defense applications.
3. A Renewable Bio-Energy Compressed Biogas Plant was unveiled, demonstrating the integration of sustainable energy solutions in defense manufacturing.
4. An MoU was exchanged between NIBE Group and Black Sky for cooperation in satellite assembly, expanding the scope of defense-related space technology collaboration.

2.Current Status of Defence Production in India

Sectoral Contribution Analysis

1. In financial year 2024-25, defence public sector undertakings accounted for 57.50 percent of total defence production, demonstrating the continued dominance of state-owned enterprises.
2. Indian ordnance factories contributed 14.49 percent, while non-defence public sector undertakings contributed 5.4 percent to the overall defence production.
3. The remaining share comes from private sector companies, which are increasingly playing a significant role in India's defense manufacturing landscape.

Remarkable Growth Trajectory

1. The defence budget has witnessed substantial growth, increasing from 2.53 lakh crore rupees in 2013-14 to 6.81 lakh crore rupees in 2025-26, reflecting increased government commitment.
2. In 2024-25, India achieved its highest-ever defence production of 1.50 lakh crore rupees, more than three times the 46,429 crore rupees recorded in 2014-15.
3. This exponential growth demonstrates the effectiveness of policy reforms and initiatives undertaken to boost domestic defence manufacturing.

Shift Toward Indigenous Production

1. Currently, 65 percent of defence equipment is manufactured domestically, marking a significant shift from the earlier 65-70 percent import dependency.
2. India targets 3 lakh crore rupees in defence production by 2029, reinforcing its position as an emerging global defence manufacturing hub.
3. This transformation reflects not only quantitative growth but also qualitative improvements in technological capabilities and manufacturing standards.

3. Significance of Defence Self-Reliance

Strategic Autonomy

1. Defence self-reliance eliminates dependence on foreign powers for critical military hardware, preserving a nation's sovereign foreign policy and freedom of action.
2. It ensures that India can pursue its national interests without facing geopolitical pressure, sanctions, or supply disruptions during critical periods.
3. Strategic autonomy enables India to maintain an independent stance on global issues while ensuring continuous access to defense equipment.

Operational Security

1. Indigenous production protects sensitive military infrastructure and command systems from foreign-controlled technology such as GPS or foreign software dependencies.
2. It ensures uninterrupted and secure operations, eliminating risks associated with potential technology denial or surveillance through imported systems.
3. Self-reliance in critical defense technologies prevents strategic vulnerabilities that could be exploited during conflicts.

Tailored Defence Solutions

1. Domestic manufacturing allows militaries to design and procure platforms specifically customized to unique terrain, strategic threats, and combat doctrines.
2. Indigenous artillery and missile systems can be developed considering specific operational requirements of Indian armed forces across diverse geographic conditions.
3. Customization ensures optimal performance of defense equipment in Indian operational environments ranging from high-altitude regions to maritime domains.

Economic Growth and Development

1. Defence manufacturing drives heavy domestic industrial development, reduces costly import bills, and builds a robust ecosystem creating high-tech employment opportunities.
2. It generates substantial revenue through future defence exports, contributing to economic growth and technological advancement.
3. The defense sector creates multiplier effects across allied industries including electronics, metallurgy, aerospace, and advanced materials.

4. Government Measures to Promote Defence Manufacturing

Defence Industrial Corridors

1. Two defence industrial corridors have been established in Tamil Nadu and Uttar Pradesh to bolster the defence manufacturing ecosystem.
2. These corridors provide dedicated infrastructure, testing facilities, and supportive regulatory frameworks to attract private sector investment in defence production.

Innovation and Testing Infrastructure

1. Government schemes such as iDEX promote innovation within the Defence and Aerospace ecosystem by supporting startups and MSMEs.
2. The Defence Testing Infrastructure Scheme provides access to world-class testing facilities, reducing dependence on foreign certification and validation.

SRIJAN Initiative

1. Self-Reliant Initiatives through Joint Action was launched by the Department of Defence Production in 2020 to promote indigenization under Atmanirbhar Bharat.
2. It serves as a common platform for Defence Public Sector Undertakings and Armed Forces to list imported items for domestic manufacturing.
3. The initiative facilitates industry engagement and technology transfer for import substitution.

Ease of Doing Business Reforms

1. In 2019, the Defence Product List was streamlined to reduce items requiring manufacturing licenses, simplifying entry for private companies.
2. The validity of defence licenses has been extended from three years to 15 years, with further extension options up to 18 years, providing long-term business certainty.

Defence Acquisition Procedure 2020

1. It promotes indigenous design, development and manufacturing, prioritizing Make in India categories in procurement decisions.
2. The procedure provides preferential treatment to domestically manufactured products, encouraging local industry participation.

5. Challenges Ahead

1. India continues to depend on imports for several advanced defence technologies and critical components including jet engines and semiconductors.
2. Research and development expenditure in the defence sector remains comparatively limited, affecting innovation and technology development capabilities.
3. Technological gaps exist in areas such as cyber warfare, advanced sensors, artificial intelligence applications, and hypersonic technologies.
4. Private sector participation still faces regulatory challenges, complex procurement procedures, and payment delays affecting business viability.
5. Achieving global competitiveness in defence exports requires sustained investment in quality assurance mechanisms, international certifications, and after-sales support infrastructure.

6. Way Forward

1. **Strengthen R&D Capabilities** – India should significantly increase investment in indigenous research and development for emerging defence technologies including artificial intelligence, quantum computing, directed energy weapons, and autonomous systems.

2. **Enhanced Public-Private Collaboration** – Greater collaboration between DRDO, private industries, startups, and academic institutions through joint ventures, technology sharing agreements, and innovation challenges is essential for accelerating capability development.
3. **Skill Development Programs** – Specialized training programs should be launched to create a skilled workforce for emerging defence technologies, with focus on advanced manufacturing, aerospace engineering, cyber security, and electronic warfare systems.

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