

GOVERNMENT OF INDIA
MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE

LOK SABHA
UNSTARRED QUESTION NO. 3903
TO BE ANSWERED ON 16.03.2026

Power usage Effectiveness Standards

3903. SHRI RAO RAJENDRA SINGH:

Will the Minister of ENVIRONMENT, FOREST AND CLIMATE CHANGE be pleased to state:

- a) whether mandatory Power Usage Effectiveness (PUE) standards have been established for data centres, if so, the details thereof;
- (b) whether Green Building certifications (Leadership in Energy and Environmental Design, Indian Green Building Council) are being mandated or incentivised for new data centre construction and if so, the details thereof;
- (c) the details of water efficiency standards being applied to prevent over-consumption in water-stressed regions; and
- (d) whether environmental impact bonds or performance-linked carbon offset programmes are available for data centre operators and if so, the details thereof?

ANSWER

MINISTER OF STATE IN THE MINISTRY OF ENVIRONMENT, FOREST AND CLIMATE CHANGE
(SHRI KIRTI VARDHAN SINGH)

(a)-(c) The Government of India is continuously encouraging data centre providers to adopt sustainable technologies resulting in betterment of Power Usage Efficiency (PUE). The Bureau of Energy Efficiency (BEE), Ministry of Power, has established norms and standards for efficient electricity consumption in data centres mentioned in Energy Conservation Building Code (ECBC 2017), published under the Energy Conservation Act, 2001. ECBC addresses requirements for energy utilization in chillers Heating, Ventilation, Air Conditioning (HVAC), Air Handling Units (AHU) Fans etc.

The Indian Green Building Council (IGBC) certification of data centres is governed by professionally administered certification frameworks, and the decision to obtain such certification rest with the data centre developers.

The water requirement depends on the type of cooling mechanism data centre deploys. The data centre industry is adopting advanced cooling technologies such as direct-to-chip liquid cooling, adiabatic cooling, immersion cooling etc.

Industry is also deploying high density racks to efficiently support high-performance computing & AI workloads for further reduction of power and water consumption.

(d) The activities of the Building Construction Projects and Township and Area Development Projects are covered under the Environment Impact Assessment (EIA) Notification, 2006 as amended. The applicable projects are required to obtain Environmental Clearance (EC). The ECs are granted based on the Technical Expert Appraisal Committee (EAC) recommendations. Various specific and standard conditions are required to be complied with by the Project Proponents including the concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc.
