

GOVERNMENT OF INDIA
DEPARTMENT OF ATOMIC ENERGY
RAJYA SABHA
UNSTARRED QUESTION NO - 2882
ANSWERED ON 13/08/2026

OPERATIONAL STATUS OF KALPAKKAM MINI REACTOR

2882. SHRI SHAMBHU SHARAN PATEL
SHRI BABUBHAI JESANGBHAI DESAI
SHRI LAHAR SINGH SIROYA
DR. MEDHA VISHRAM KULKARNI

Will the PRIME MINISTER be pleased to state:-

- (a) the operational status of the Kalpakkam Mini Reactor (KAMINI) including its licensing position with the Atomic Energy Regulatory Board;
- (b) whether life-extension measures are being undertaken for KAMINI, as it nears three decades of service;
- (c) if so, the details thereof;
- (d) the research applications supported by KAMINI, including fission chamber testing and detector calibration, and whether any mechanism exists for BARC-IGCAR collaboration on utilizing its facilities;
- (e) whether any roadmap exists for KAMINI's role in supporting the third stage of India's nuclear power programme in the coming years; and
- (f) if so, the details thereof?

ANSWER

THE MINISTER OF STATE FOR PERSONNEL, PUBLIC GRIEVANCES & PENSIONS
AND PRIME MINISTER'S OFFICE (DR. JITENDRA SINGH)

- (a) Kalpakkam Mini Reactor (KAMINI) holds license for operation from Atomic Energy Regulatory Board (AERB) with validity up to June 30, 2030.
- (b) & (c) Yes. Life extension measures are being undertaken for KAMINI as it nears three decades of operation. Ageing assessment study has been undertaken while carrying out Periodic Safety Review (PSR) in 2025 and sufficient residual life is available.

All system components have been well maintained by periodic preventive maintenance as per schedule and their healthiness ascertained through mandatory surveillance checks. Many systems and components have been upgraded or replaced due to ageing and obsolescence, or for improving reliability and safety.

- (d) In KAMINI reactor, performance testing and calibration of various neutron detectors such as Fission Chamber, Ionization chambers, Self-Powered Neutron Detectors etc. are carried out on need basis to meet the requirements of Department of Atomic Energy (DAE).
- (e) & (f) In the KAMINI reactor, U-233 is used as the driver fuel and rich experience acquired so far will be useful in supporting the third stage of India's nuclear power programme.
