

Reply to Parliament Question No 417 for 24.07.2024 for Lok Sabha regarding “Artificial Intelligence” in respect of Numaligarh Refinery Limited (NRL):

Q no. (a): **whether the Government is proposing to introduce Artificial Intelligence (AI) in each public/private department across the country;**

Reply: Ministry to reply.

Q no. (b): **if so, the details thereof along with the departments in which the Government has already introduced;**

Reply: Ministry to reply.

[NRL has initiated action to adopt AI use cases in business operations. Some of the key initiatives of adoption Artificial intelligence and Machine learning are as follows-

- **AI Applications in Predictive Maintenance:** NRL has implemented the SAS analytics platform integrated with IoT sensors and AI/ML capabilities to address asset predictive maintenance and enterprise dashboarding.
- **AI in Cybersecurity Applications:** To enhance cybersecurity, NRL has deployed a Security Operation Center (SOC) for centralized monitoring, detection, and response to cyber threats.
- **AI Use Cases in Safety and Surveillance:** NRL has adopted computer vision-based solutions for safety and surveillance, including facial recognition and automatic number plate recognition for tank lorry loading operations and crew identification.
- **AI Applications in Construction Site Safety:** NRL has implemented an AI-based CCTV surveillance system to monitor and manage construction safety at its expansion project sites. Utilizing video feeds from approximately 200 CCTV cameras, the system employs AI analytics to detect and report safety violations.
- **AI In Inspection:** NRL utilizes AI-powered self-navigating robots for pipe inspections and drones to monitor the integrity of column internals and stacks where human inspection is challenging.
- **Co-Pilot Knowledge Hub:** NRL leverages Microsoft Co-Pilot LLM features for various applications, including summary extraction from MS Teams meetings, text extraction from video feeds, and document summarization, preparation of presentations, visualizing data in spreadsheets etc.]

Q no. (c): **whether the Government is aware that Artificial Intelligence is going to affect nearly 40% of all jobs, according to a new analysis made by the International Monetary Fund (IMF);**

Reply: Ministry to reply.

Q no. (d): whether the Government is also aware that this could to lower demand for labour, affect wages and even eradication of jobs; and

Reply: Ministry to reply.

Q no. (e): if so, the steps taken by the Government in this regard?

Reply: Ministry to reply.

Note for Supplementary:

Numaligarh Refinery Limited (NRL) is a Public Sector Enterprise with a 3.0 MMTPA petroleum refinery at Numaligarh in Golaghat district of Assam. Present shareholding pattern of NRL is Oil India Limited (OIL) – 69.63%, Govt. of Assam (GoA) – 26% and Engineers India Ltd (EIL) – 4.37%.

* * * * *