

**GOVERNMENT OF INDIA
MINISTRY OF RAILWAYS**

**LOK SABHA
UNSTARRED QUESTION NO.855
TO BE ANSWERED ON 26.06.2019**

SAFE AND AFFORDABLE RAILWAYS

†855. SHRIMATI RANJAN BEN DHANANJAY BHATT:

Will the Minister of RAILWAYS be pleased to state:

- (a) whether the Government proposes to make Railways efficient, safe and affordable to all;**
- (b) if so, whether the Government has taken any steps in this direction;**
- (c) if so, the details thereof; and**
- (d) if not, the reasons therefor?**

ANSWER

**MINISTER OF RAILWAYS AND COMMERCE & INDUSTRY
(SHRI PIYUSH GOYAL)**

(a) to (d): A Statement is laid on the Table of the House.

STATEMENT REFERRED TO IN REPLY TO PARTS (a) TO (d) OF UNSTARRED QUESTION NO.855 BY SHRIMATI RANJAN BEN DHANANJAY BHATT TO BE ANSWERED IN LOK SABHA ON 26.06.2019 REGARDING SAFE AND AFFORDABLE RAILWAYS

(a) to (d): Indian Railways is continually striving to improve its efficiency, safety and affordability through various initiatives. These initiatives inter-alia include the following:

A. Efficiency

Efficiency Improvement is being undertaken through various measures like new technology induction & modernization, Information Technology interventions, operational improvements and financial efficiency improvements through revenue enhancement & cost reduction. These are listed below:

(i) Induction of new technology and modernization

Indian Railways is constantly striving to induct new technologies and modernize its fixed and moving assets. Key initiatives in this direction include modern electronic signaling systems, modern high horsepower locomotives with capabilities for achieving higher speeds, regenerative feature in electric locomotives to reduce energy conservation, higher capacity wagons, new design wagons for new commodities like automobile, bulk fly ash/cement, steel products etc, higher capacity couplers and draft gears, higher speed modern trains like “Vande Bharat”, three phase ac technology Electrical Multiple Units (EMU)/Mainline Electrical Multiple Units (MEMU), bio toilets in coaches, modernization of production units, workshops and sheds etc.

(ii) Use of Information Technology (IT)

Steps have been taken to make Indian Railways more efficient through use of various IT interventions in areas of passenger and freight business interface, train operations, financial resource management,

asset maintenance, procurement etc. Key IT applications developed by IR include Passenger Reservation System (PRS), Unreserved Ticketing System (UTS), National Train Enquiry System (NTES), Parcel Management Information System (PMIS), Freight Operation Information System (FOIS), Integrated Coach Management System (ICMS), Control Office Application (COA), Crew Management System (CMS), Software Aided Train Scheduling System (SATSANG), Real Time Train Information System (RTIS), Accounting Information Management System (AIMS), Traffic Accounts Management System (TAMS), E- Procurement System (EPS), Integrated Material Management System (IMMS), Vendors Interface Management System (VIMS), Indian Railway Projects and Sanction Management System (IRPSM) and Track Management System (TMS). Further, other IT related initiatives include the following:

- **Wi-fi services provided at more than 1600 stations**
- **Hand held Point of Sales Machines provided to catering staff**
- **Closed Circuit Television (CCTV)/Video surveillance system in trains and stations**
- **CCTV cameras in base kitchens with artificial intelligence to detect and rectify deficiencies in hygiene**
- **E-catering services to passengers**
- **Rail Drishti dashboard to bring information from various sources on a single platform and provide a bird's eye view of the Railways**

(iii) Operational and infrastructural improvements

It has been decided to undertake various operational improvements to improve efficiency. These include - right powering of freight and passenger trains in a phased manner to speed up trains, doubling/tripling/quadrupling of tracks and removal of operational bottlenecks to remove congestion and improve mobility, 100 per cent electrification of Indian Railways' Broad Gauge network for seamless

and efficient movement of electric trains etc. Further, in order to segregate passenger and freight services and increase carrying capacity and speed of trains, construction of the Eastern and Western Dedicated Freight Corridors (DFC) has been fast tracked. DFCs which will be fully electrified, high axle load (25 ton) corridors with freight trains running at a maximum speed of 100 kmph will improve efficiency of freight transportation.

(iv) Revenue enhancement and cost reduction

Railways have been striving to optimize its financial efficiency by effective monitoring of the revenue expenditure and augmenting the revenues. Revenue enhancing measures, inter alia, include targeting progressively higher traffic throughput, effective and innovative marketing strategies to capture more traffic, creation of additional capacity to carry new traffic and tapping non fare revenue sources. Simultaneously, regular measures are undertaken to ensure optimum utilization of the existing rail infrastructure and enhance productivity of locomotives, coaches and wagons. Expenditure control measures include strict economy and austerity measures, improved man-power planning, better asset utilization, inventory management, optimizing fuel consumption etc.

B.Safety

Safety is accorded the highest priority by Indian Railways and all possible steps are undertaken on a continual basis to prevent accidents and enhance safety. Indian Railways have achieved best ever safety record in 2018-19. The safety initiatives include the following:

(i) Timely replacement of over-aged assets and adoption of modern technologies for up-gradation and preventive maintenance of track, bridges, signaling and telecommunication systems, locomotives, coaches and wagons. Speedy execution of rail renewals, construction of

Foot over Bridges and High Level Platforms, Road over Bridges and Road under Bridges are major priorities. Indian Railways has also switched over to production of safer Linke Hofmann Busch (LHB) coaches.

(ii) Key technological interventions to enhance safety include provision of automatic block signaling, replacement of mechanical interlocking signaling with electronic interlocking, track circuiting, provision of Block Proving Axle Counters, Light Emitting Diode (LED) Colour Light Signals, Train Protection and Warning System, vigilance control devices and GPS-based Fog Pass devices in locomotives, higher Ultimate Tensile Strength (UTS) rails, thick webs switches, pre-stressed concrete sleepers, Ultrasonic Flaw Detection of rails and welds to detect internal flaws in rails/welds, European Train Control System (ETCS) level 2 or equivalent systems and indigenously under development Train Collision Avoidance System (TCAS) etc.

(iii) All Unmanned Level Crossing Gates on Broad Gauge network have been removed in January 2019. This will greatly enhance safety of road users and also rail passengers. Now Indian Railway is working towards interlocking of all level crossing gates. Elimination of manned level crossing gates on critical sections is also being expedited.

(iv) A dedicated fund 'Rashtriya Rail Sanraksha Kosh' (RRSK) has also been set up in 2017-18 to fund critical safety related works. It has a corpus of Rs. 1 lakh crore to be utilized over a period of five years.

(v) All safety category staff are given training on regular basis as per prescribed periodicity at various stages of their career. Mandatory initial, promotional, refresher and specialized training programs are provided.

C.Affordability

Since inception, Indian Railways is striving to provide safe, reliable and affordable means of transport for the citizens of the country. To cater to

various strata of society and make rail travel affordable, various classes of coaches including sleeper, general (unreserved) and air conditioned (3 tier) coaches are provided in most trains. Passenger fare structures are significantly subsidized. Further, Railways provide connectivity to various parts of the country including the remotest places with a view to provide affordable rail transport to all citizens. These connectivity projects inter alia include the longest rail cum road bridge “Bogibeel bridge” to connect Arunachal Pradesh to rest of the country.
