

## Transport

### Issues & Challenges :-

- ⇒ Large scale investment for capacity creation
- ⇒ Transport efficiency is low; avg. speed of movement of all modes is low & cost is high.
- ⇒ Distortion in overall transport movement of goods; Country transport much through roads (87% compared to 22% of China, 32% of USA). In contrast share of rail is 36% compare to 47% of USA
- ⇒ need to provide transport access to large undererved areas of the country (e.g. NE, J&K, islands)
- ⇒ Safety is a major concern
- ⇒ Near absence of an integrated regulatory regime for overseeing tariff setting, cost of operations, anti-competitive prices etc.

Railways:- fourth largest rail network in terms of route km.

- Considering size of country, expansion has been inadequate
- Network need extensive modernization, increase of speeds, improvement in safety to meet rapidly growing need of the country.
- There is need for much faster expansion of freight network along with capability to carry larger freight per wagon & deliver it faster.
- System must be env<sup>n</sup> friendly and economically efficient transport movement.
- Create equal railway system, priority to women's safety & security;
- Expansion to unaccessible areas such as Himalayan region, tribal areas
- Stepping up of pri. investment
- Investment need to be prioritized in imp areas viz DFCP & port connectivity.
- Along with new capacity addition, improving productivity of existing network would be crucial
- measures to reduce rail accidents: Development of train protection & warning system (SPWS), TCAS; 'crash worthy' structural design

- Investment can be stepped up through PPP.
- Tariff structure is deeply distorted with low passenger fare & high freight fare
- The current dept org. of railways is not conducive to running of railways as an economic enterprise. Railway Board should be re-org. along business line. This view has also been strongly endorsed by Kakodkar committee & Pidsoda committee.

ROADS:- NHs with which comprise 2% of road net. carry 40% of road based traffic.

- Road network is unable to handle high traffic density and high speed at many places < has poor riding quality.
- long delays in implementation of projects; need to accelerate completion of AOR & NS-RW corridor.
- Only 23% of NHs is wider than two lanes. Shortfall in construction of bypasses, inadequate capacity, weak narrow bridges as well as ROBs are some other deficiency.
- NHDP, SARDP - NE, Roads for LWE districts

- SHs & rural roads: low investment, inadequate width, congested stretches, poor safety  
features are some of the deficiencies
- Delay in pre construction activities due to delay in land acquisition, delay in envr clearances, shifting of utilities, weak mngt by contractor and poor implementation capacities of PWDs., Neglect of maintenance of roads
- PRISM: 500 persons in plain areas, 250 in hilly areas  
benefits: agri/hort benefits (marketing, productivity), health, education, employment generation, effective monitoring by govt officials.
- Rural roads as one of the components of Bharat Nirman
- NCIF of Govt is provided to road sector.
- Need for regulation

#### (iv) Inland Water Transport (IWT):

- With share of 0.4% in total cargo handled in the country, it is an underdeveloped mode of transport.
- India has potential of 14500 navigable waterways but so far 2716 km has been commercially utilized.

- IWT is best suited for bulk cargo, hazardous cargo.
- It is envr friendly ; total external cost after accounting for all externalities are seven times lower than road transport.
- On cargo (NW-I) there are 10 thermal plants < 10 are proposed. gwt can be useful for transportation of coal to these plants.
- total 6. National Waterways ;
- All weather IWT has strategic significance in the NE as it helps to avoid congested WB-sikkim narrow corridor. Several NE states can be reached through IWT routes ( Brahmaputra & Barak)
- There is transport subsidy for movement of raw materials and finished goods for new industries of NER but this is applicable only for rail & road and not to IWT. similarly case with fertilizer subsidy.
- Development of IWT is an eligible sector for viability gap funding and India Infra pgm except fund.

Ports:- coastline of 7517 km, 12 major ports handle 60% of cargo & 200 non major ports.

- Almost 95% by volume and 70% by value of India's global merchandise trade is carried through sea route.
- Need to ensure adequate investment in port sector to meet the growing capacity needs of our int'l. coastal trade, improve efficiency by reducing dwell time and turnaround time and introduce legislative & institutional reform to support this.

Civil Aviation:- The sector contribute to development by generating employment directly & indirectly besides facilitating enhancement of productivity & efficiency in the movement of goods & services.

- Air connectivity to remote and inaccessible areas with special reference to PER.
- A major difficulty being faced by airlines is the high cost of ATF, which is further aggravated by taxes. Cost of ATF constitute 40-50% total operating cost. ATF is distorted due to multiple cascading taxes.
- Major airports are at a considerable distance from the city centre; the current share of cargo transportation is fairly low in India;
- Concerns regarding safety; The congestion in sky also poses threat of near-misses & collision warnings.
- The increase in number of movements affects runway safety, ramp safety, precautionary landings, aborted take off, & other serious safety threats.
- There is an acute shortage of trained pilots/ commanders in India; Many courses of some of the pilot training institutions are not recognised by DGCA.
- CHAIN: The Indian Satellite Based Augmentation system (SBAS) for Air navigation system (ANS). Jointly undertaken by AAI & ISRO to achieve smooth transition to satellite based navigation.