

Understanding MDR- Merchant Discount Rate

Relevancy:

- GS Prelims
- Economic concepts, Merchant Discount rate (MDR)

Recently:

- Recently, the RBI has decided to rationalize the MDR on debit card transactions from New Year.
- In India, the RBI specifies the maximum MDR charges that can be levied on every card transaction.

Understanding MDR:

- The rate charged to a merchant by a bank for providing debit and credit card services. The rate is determined based on factors such as volume, average ticket price, risk and industry.
- The merchant must set up this service with a bank, and agree to the rate prior to accepting debit and credit cards as payment.
- The MDR compensates the bank issuing the card, the bank which puts up the swiping machine (Point-of-Sale or PoS terminal) and network providers such as Mastercard or Visa for their services.
- MDR charges are usually shared in a pre-agreed proportion between them.

What are the changes?

- With effect from January 1 2018, small merchants will pay a maximum MDR of 0.40 per cent of the bill value and others will shell out 0.90 per cent.
- To prevent those MDR charges from sky-rocketing, RBI has also set a monetary cap at ₹200 per bill for small merchants and ₹1,000 for large ones.
- As per RBI rules, the merchant must cough up the MDR out of his own pocket and cannot pass it on to the customer.
- To calculate MDR, small merchants are defined as those with a turnover of upto ₹20 lakh in the previous year. They will pay an MDR of 0.4 per cent against 0.9 per cent for others.

- This has been done in order to ensure wider acceptance of plastic money and increase the spread of PoS machines (Point of Sale)

Brainyias

Topic 2

India State Level Disease Burden Report, 2017

Relevancy:

- GS Prelims, GS mains paper I and II
- Policies, Governance, Health indicators, State level disease burden report (2017)

Recently:

- A report titled “India State-Level Disease Burden” was released recently.
- The report is first of its kind and presents assessments of causes of diseases in each state for the period 1990 to 2016.
- A team of scientists evaluated the diseases causing the most premature deaths and ill-health in each State.

Indications of the report:

- Life expectancy at birth in the country has improved significantly.
- There exist many health inequalities among States: While there was a fall in the under-five (U-5) mortality in every State there was also a four-fold difference in the rate of improvement among them.
- Life expectancy at birth improved in India from 59.7 years in 1990 to 70.3 years in 2016 for females, and from 58.3 years to 66.9 years for males. There were, however, continuing inequalities between states, with a range of 66.8 years in Uttar Pradesh to 78.7 years in Kerala for females, and from 63.6 years in Assam to 73.8 years in Kerala for males in 2016.
- The under-5 mortality rate has reduced substantially from 1990 in all states, but there was a four-fold difference in this rate between the highest in Assam and Uttar Pradesh as compared with the lowest in Kerala in 2016, highlighting the vast health inequalities between the states.
- Of the total disease burden in India measured as DALYs (Disability Adjusted Life Years), 61% was due to communicable, maternal, neonatal, and nutritional diseases (termed

infectious and associated diseases in this summary for simplicity) in 1990, which dropped to 33% in 2016. There was a corresponding increase in the contribution of non-communicable diseases from 30% of the total disease burden in 1990 to 55% in 2016, and of injuries from 9% to 12%.

- The burden of most infectious and associated diseases reduced in India from 1990 to 2016, but five of the ten individual leading causes of disease burden in India in 2016 still belonged to this group: diarrhoeal diseases, lower respiratory infections, iron-deficiency anaemia, preterm birth complications, and tuberculosis.
- The burden caused by these conditions generally continues to be much higher in the Empowered Action Group (EAG) and North-East state groups than in the other states, but there were notable variations between the states within these groups as well.
- The burden also differed between the sexes, with diarrhoeal disease, iron-deficiency anaemia, and lower respiratory infections higher among females, and tuberculosis higher among males.
- The proportion of total disease burden caused by infectious and associated diseases was highest among children, which contributed to the disproportionately higher overall disease burden suffered by the under-5 years age group.
- The contribution of most of the major non-communicable disease groups to the total disease burden has increased all over India since 1990, including cardiovascular diseases, diabetes, chronic respiratory diseases, mental health and neurological disorders, cancers, musculoskeletal disorders, and chronic kidney disease.
- Among the leading non-communicable diseases, the largest disease burden or DALY rate increase from 1990 to 2016 was observed for diabetes, at 80%, and ischaemic heart disease, at 34%.
- While the disease burden due to child and maternal malnutrition has dropped in India substantially since 1990, this is still the single largest risk factor, responsible for 15% of the total disease burden in India in 2016.
- This burden is highest in the major EAG states and Assam, and is higher in females than in males.
- Child and maternal malnutrition contributes to disease burden mainly through increasing the risk of neonatal disorders, nutritional deficiencies, diarrhoeal diseases, lower respiratory infections, and other common infections
- Unsafe water and sanitation was the second leading risk responsible for disease burden in India in 1990, but dropped to the seventh leading risk in 2016, contributing 5% of the total disease burden, mainly through diarrhoeal diseases and other infections.

Causes of differences among the states:

- The differences can be attributed to differences in the development status, environment, lifestyle patterns, preventive health measures and curative health services between the States.
- In the most developed States this transition took place about 30 years ago, but in the poorest States this transition has taken place only over the past few years.

Applications of the data:

- The policy applications of these findings include planning of State health budgets, prioritisation of interventions relevant to each State, informing the government's Health Assurance Mission in each State, monitoring of health-related Sustainable Development Goals targets, and assessing the impact of large-scale interventions based on time trends of disease burden.
- The data gaps identified in this estimation process will inform which areas of the health information system of India need to be strengthened.

Topic 3

Fertilisers consumption in India

Relevancy:

- GS Prelims, GS Mains paper III, Optional- Economy, Geography, Agriculture
- Agriculture, Geography, Economy, Fertilizer consumption

Recently:

- In his 'Mann ki Baat', Prime Minister Narendra Modi asked farmers to cut urea consumption by half by 2022 (On 26th Nov, 2017).
- Case Study: The PM cited an example of farmers in Tohu village in Himachal Pradesh's Hamirpur district who have increased wheat productivity by three times, reduced urea consumption significantly through the use of soil health cards (SHCs) and increased their income by Rs 5,000 to 6,000 per acre.
- This call by the PM took the fertiliser industry by surprise. The industry had its flagship annual event on December 5 and 6 in Delhi, where thousands of global and Indian fertiliser industry stakeholders had gathered to exchange ideas, talk about innovations and draw up investment plans.

Fertilizer consumption in India- Trends:

- India is an important market, consuming about 30 million tonnes (MT) of urea annually, of which about 24.5 MT is domestically produced and the rest is imported.
- Most of the industry players had been projecting increasing consumption of urea in India, given that higher incomes have increased the demand for food in the country.
- In such a situation, the PM's call for halving urea consumption by 2022 was somewhat puzzling to the fertiliser industry, more so when the government itself is trying to increase urea production.
- The government has plans to revive four dormant urea plants in **Gorakhpur** (Uttar Pradesh), **Barauni** (Bihar), **Talcher** (Odisha) and **Ramagundam** (Telangana).

- However, it is also true that in the last five years, urea consumption on a per hectare basis, has stagnated in India and the overall per hectare consumption of nitrogen (N), phosphorous (P) and potassium (K) has declined somewhat (see Fig).
- But is this due to dramatic changes in pricing of **DAP (diammonium phosphate)** and **MOP (muriate of potash)** as result of the **Nutrient Based Subsidy (NBS)** scheme?
- Can we ascribe the fall in consumption to government policies such as those pertaining to **SHC (Soil Health Card)** or **Neem Coated Urea (NCU)**? Or does the decline have anything to do with the falling profitability of several crops in the past four years? Perhaps a mix of these factors has led to a stagnation in urea consumption.

Skewed prices of Urea in India:

- It is well-known that urea prices in India are among the lowest in the world (hovering around \$ 86 per tonne).
- Urea prices in neighbouring countries in South and Southeast Asia, including China, are at least two to three-times higher. Also, the price ratio of urea to DAP and MOP is highly skewed.
- No wonder, Indian farmers are using **higher doses of urea (nitrogen)** compared to phosphate (DAP) and potash (MOP), and not getting the best results in terms of yields.
- Also Indian soils are **deficient in micronutrients**, especially zinc (about 48 per cent) — a fallout of which is zinc deficiency in wheat and rice, which, in turn, contributes to stunting in children.
- The imbalanced use of N, P and K, therefore, needs urgent correction. Extremely low prices of urea also lead to its diversion to non-agricultural uses — as well as smuggling to neighbouring countries — that needs to be checked.
- Given these realities, serious thought needs to be given to the PM's call to slash urea consumption.
- The PM's call is as important as his call on February 28, 2016 to double farmers' incomes by 2022.
- The latter led to the formation of a government committee that has prepared 14-volume report.
- One should not be surprised if a similar effort goes in preparing a report to halve urea consumption by 2022.

Performance of SHC (Soil Health Cards) and NCU (Neem Coated Urea) Schemes:

- However, there are already at least two programmes, SHC and NCU, to reduce urea consumption, at least in the short-run. NCU, in fact, has been in place since 2008, when only 20

per cent urea was permitted to be neem coated. This was raised to 35 per cent in 2010, and to 100 per cent in 2015.

- The underlying assumption is that NCU can improve **nitrogen use efficiency (NUE)** by about 10 per cent by slowing the release of nitrogen.
- The SHCs, which have now crossed the 100 million mark, can also help rationalise the use of urea, provided they are backed by a massive extension programme.

How can the misuse of Urea be corrected?

- The biggest policy instrument, pricing of urea, remains highly distorted.
- So long as this policy is in place, it will be difficult to achieve any significant reduction in urea consumption, the SHCs and NCU notwithstanding.
- The record of political parties over the past 15 years or so does not give us hope that the pricing will be corrected to reflect the true cost of production.
- There is talk of **direct benefit transfer (DBT)** of subsidies, though, and the government seems to have agreed on the idea in principle.
- If the government decides to shift the money equivalent of the current fertiliser subsidy bill of Rs 70,000 crore plus directly to farmers' accounts, and lets the prices of fertilisers be decided by the full play of demand and supply forces, it can immediately stop all diversion to non-agri-uses as well as to other countries.
- The move will also give the right signals to farmers to use N, P and K in appropriate ratios. It will also excite industry to innovate and bring new products — a win-win situation for all.
- If the government can move quickly in that direction, there is hope to cut urea consumption significantly, at least for some time.

Topic 4

Sendai Framework and NDMA

Relevancy:

- GS Prelims, GS Mains paper III
- Disaster Management, Sendai Framework, UNISDR-GETI

Recently:

- Union Minister of State for Home Affairs, inaugurated the first national-level Training of Trainers programme to sensitise various Central Ministries and Departments on utilisation of **Sendai Monitor** for developing action plans for **Disaster Risk Reduction (DRR)**.
- The three-day programme is being organised by the National Disaster Management Authority (NDMA) in collaboration with the **United Nations Office for Disaster Risk Reduction-Global Education and Training Institute (UNISDR-GETI)** from December 18-20, 2017.

About Sendai Framework:

- The **Sendai Framework for Disaster Risk Reduction (SFDRR), 2015-2030**, is the first major agreement of the post-2015 development agenda and identifies targets and priority actions towards reducing disaster risks and implementing development that is both resilient and sustainable.
- India, being a signatory to the SFDRR, is committed to work towards achieving the targets enshrined in the Framework.
- In June 2016, India became one of the first countries to align its **National Disaster Management Plan (NDMP)** with the SFDRR, which clearly identifies regional, national and local targets along with short, medium and long-term timelines.
- This training programme will build the capacity of the participants to utilise defined indicators to monitor the progress of the Sendai targets.

Targets and Priorities under the Sendai Framework:

- The Sendai Framework for Disaster Risk Reduction 2015-2030 outlines seven clear targets and four priorities for action to prevent new and reduce existing disaster risks:
 - (i) Understanding disaster risk;
 - (ii) Strengthening disaster risk governance to manage disaster risk;
 - (iii) Investing in disaster reduction for resilience and;
 - (iv) Enhancing disaster preparedness for effective response, and to "Build Back Better" in recovery, rehabilitation and reconstruction.

To support the assessment of global progress in achieving the outcome and goal of the Sendai Framework, seven global targets have been agreed:

1. Substantially reduce global disaster mortality by 2030, aiming to lower average per 100,000 global mortality between 2020-2030 compared to 2005-2015;

2. Substantially reduce the number of affected people globally by 2030, aiming to lower the average global figure per 100,000 between 2020-2030 compared to 2005-2015;
 3. Reduce direct disaster economic loss in relation to global gross domestic product by 2030;
 4. Substantially reduce disaster damage to critical infrastructure and disruption of basic services, among them health and educational facilities, including through developing their resilience by 2030;
 5. Substantially increase the number of countries with national and local disaster risk reduction strategies by 2020;
 6. Substantially enhance international cooperation to developing countries through adequate and sustainable support to complement their national actions for implementation of the framework by 2030;
 7. Substantially increase the availability of and access to multi-hazard early warning systems and disaster risk information and assessments to the people by 2030.
- It aims to achieve the substantial reduction of disaster risk and losses in lives, livelihoods and health and in the economic, physical, social, cultural and environmental assets of persons, businesses, communities and countries over the next 15 years.
 - The Framework was adopted at the Third UN World Conference on Disaster Risk Reduction in Sendai, Japan, on March 18, 2015.