#1 19 Dec 2021

# Current State of the Indian Economy

A review series

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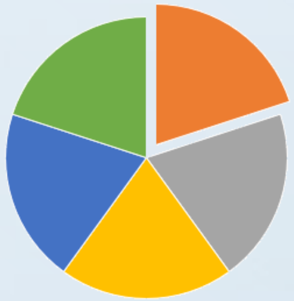
# a few caveats on interpretation

- Fallacy of composition
- Fallacy of division
- Hasty generalisation
- Flaw of averages

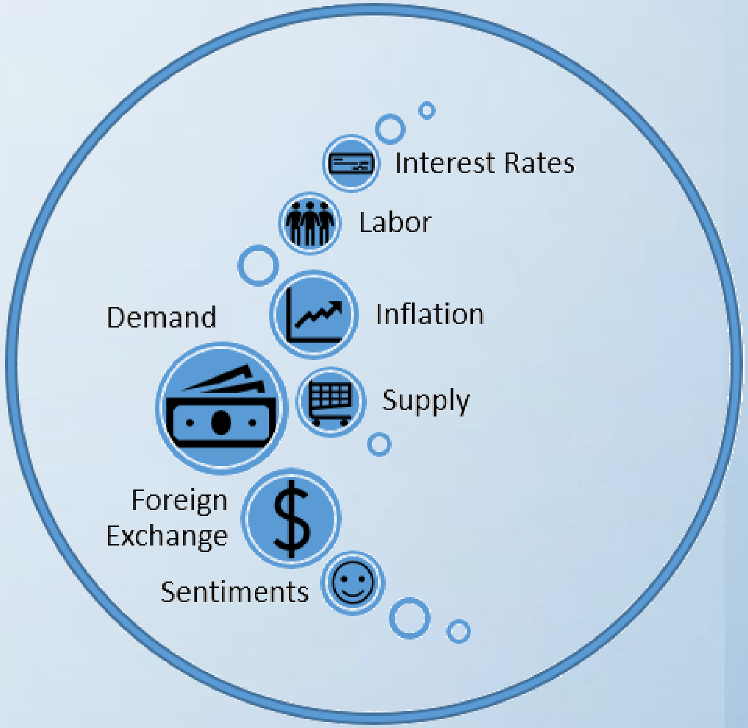
# Caveat 1

- Professor Paul Samuelson's warning of informal fallacies
  - ***Fallacy of composition*** *is an informal fallacy that arises when one infers that something is true of the whole from the fact that it is true of some part of the whole. ... fallacy of composition can apply even when a fact is true of every proper part of a greater entity, though…..****Do not project from one part of the economy upon the aggregated economy***
  - ***Fallacy of division*** *is an informal fallacy that occurs when one reasons that something that is true for a whole must also be true of all or some of its parts…. ****Do not project from the aggregated economy on to one part of the economy***



# Caveat 2

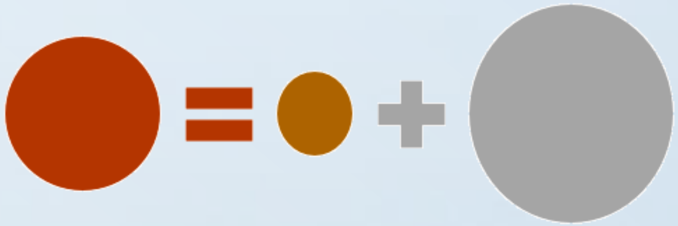
- Generalisation is an inference about every member of a category of things or events derived from evidence about a few members of that category
- Generalisation can be done in an anecdotal or adhoc manner, where we accept a belief or behaviour on the basis of a weak or biased generalisation. Valid generalisation instead, depends of an unbiased and representative sample of the entire category (population)
- Use adequate and appropriately sampled data and reports… ***Avoid hasty generalisation***



# Caveat 3

- Economic indicators often use averaging
- Flaw of Averages: analysis and plans based on the assumption that average conditions will occur are wrong on average. An example involves the statistician who drowned while fording a river that was, on average, only three feet deep.
- Flaw tends to tangle up investment management, production planning and government projections.

….. ***Besides averages, evaluate the decomposition of the reported data***



# #1 : Current State of the Indian Economy
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# a. Managing Supply & Demand – Key Objectives

- Policymakers have 2 important roles to play.
  - Managing demand where the objective is to control inflation & unemployment.
  - Increase the long-term availability of per capita output
- Demand management policies, that is, fiscal, monetary, or combination of both, are quite effective in the short run.
- Supply policy measures to increase the supply of output requires time. In the long run, components such as investment in education, healthcare, and physical infrastructure will have an influence over the availability of future supply of output.
- Demand-side component of output is referred to as the transitory or cyclical component, while supply-side component of output is known as trend component or full employment level of output.
- We look at primarily macroeconomic demand status in this review

# a. Managing Supply & Demand - GDP

- Output produced in a country is measured in terms of GDP. GDP is the market value of all final goods and services produced in a country during any given financial year.

- A 'final' good or service is one that is purchased by its final user and is not turn included in the production of any other goods or services.

- GDP is measured in value terms to avoid problems arising out of adding together 'mangoes' with 'widgets' while counting the quantity of production.

- We calculate the GDP by adding up all the wages, interest, rent, and profit components - the total money spent for producing final goods and services. Total value of production must be equal to the total income generated in the economy.

- GDP is a bit different from GNP. GDP usually refers to the total value of goods and services produced within the country. On the other hand, GNP is the value of goods and services produced by an Indian citizen and firm, even if the production takes place outside India. GDP is decomposed into its components:

- **GDP = Consumption + Investment + Government + Export - Import**

*Above textbook equation is reclassified in Indian government reports on GDP, as shown below:*

- **GDP = Private Consumption Expenditure + Government Consumption Expenditure + Gross Fixed Capital Formation + Change in Stocks + Valuables + Exports - Imports**

# a. Managing Supply & Demand – GDP demand side

- **Consumption Expenditure (C)**: Everyone like you & me consumes some goods and services to meet our daily requirements. They range from groceries to consumer durables. Consumption of services refers to using facilities such as telecommunication, banks, private healthcare, etc

- Government statistics, has consumption expenditure referred to as private final consumption expenditure (PFCE). PFCE includes spending only on non-durable consumer goods and services and all goods except land, building, and any other items with longevity less than a year.

- Durables are not a part of PFCE and are instead a part of the private investment expenditure.

- Purchase and construction of residential buildings are included in gross capital formation and not in PFCE.

- Valuables such as precious stones, jewellery, artworks, etc., are not counted as part of the PFCE.

# a. Managing Supply & Demand – GDP demand side (2)

- **Consumption Expenditure (C)**: It also includes Government final consumption expenditure (GFCE) is an aggregate transaction amount on a country's national income accounts representing government expenditure on goods and services that are used for the direct satisfaction of individual needs (individual consumption) or collective needs of members of the community (collective consumption).

- Government expenditures are carried out with the objective of maximizing social welfare. The government spends money predominantly with the objective of providing public goods. Public goods are something which are non-rivalrous and non-excludable in nature—that is, consumption of the good by one individual does not reduce the amount of the good available for consumption by others; and no one can be effectively excluded from using that good. Some part of expenditure is of a consumption nature, while the investment component of expenditure is classified separately.

- Government also spends money to better distribution of income among its citizens. Examples such as granting subsidies, providing employment guarantee to those below poverty line (BPL), outright grant of funds to people affected by natural calamities, etc., are undertaken with this objective.

# a. Managing Supply & Demand – GDP demand side (3)

- **Investment Expenditures (I):** This component refers to an investment component of expenditures.
- Households carry out investments in the form of buying flats, houses, land, consumer durables (with more than one year longevity), and stocks.
- Firms on the other hand carry out investments to manufacture final products using intermediate inputs.
- Gross fixed capital formation (GFCF), consists of resident producers' investments, deducting disposals, in fixed assets during a given period. Fixed assets are tangible or intangible assets produced as outputs from production processes that are used repeatedly, or continuously, for more than one year.
- GFCF is called "gross" because the measure does not make any adjustments to deduct the consumption of fixed capital (e.g., depreciation of fixed assets).

# a. Managing Supply & Demand – GDP demand side (4)

- **Investment Expenditures (I):** It includes government investment expenditures
- Government expenditures—unlike private investment expenditures—are carried out with the objective of maximizing social welfare. The government spends money predominantly with the objective of providing public goods. Public goods are something which are non-rivalrous and non-excludable in nature—that is, consumption of the good by one individual does not reduce the amount of the good available for consumption by others; and no one can be effectively excluded from using that good. Some are of consumption nature while others are of investment nature.
- Examples of public investments include social infrastructure (school, colleges, hospitals, etc.), physical infrastructure (roads, ports, airports, water, sanitation, etc.) and institutional infrastructure (judiciary, regulatory authorities, audit organizations, police, etc.)

# a. Managing Supply & Demand – GDP demand side (5)

- **Exports (Exp):** Exports are goods and services which are produced in the domestic economy but are consumed by foreign consumers. A country can export both services and merchandise items.

- India's major export items are engineering goods, petroleum products, gems and jewellery, chemicals, and drugs and pharmaceuticals.

- **Imports (Imp):** Imports are goods and services which are produced in the foreign economy but consumed by domestic consumers. India imports both services and merchandise items.

- India's major import items are crude petroleum & products, electronic goods, gold, coal and machinery.

# a. Managing Supply & Demand – Supply side

- Gross value added (GVA) is defined as output (at basic prices) minus intermediate consumption (at purchaser prices); it is the balancing item of the national accounts' production account.
- Sum of GVA over all industries or sectors plus taxes on products minus subsidies on products gives gross domestic product

# a. Managing Supply & Demand – supply side (2)

- Major industry segments to evaluate

1. Agriculture, Forestry & Fishing
2. Mining & Quarrying
3. Manufacturing
4. Electricity, Gas, Water Supply & Other Utility Services
5. Construction
6. Trade, Hotels, Transport, Communication & Broadcasting
7. Financial, Real Estate & Professional Services
8. Public Administration, Defence & Other Services

# a. Managing Supply & Demand - Headlines

## GDP expands 8.4% in Jul-Sep quarter

Economy surpasses pre-pandemic size, boosted by services activity

Asit Ranjan Mishra
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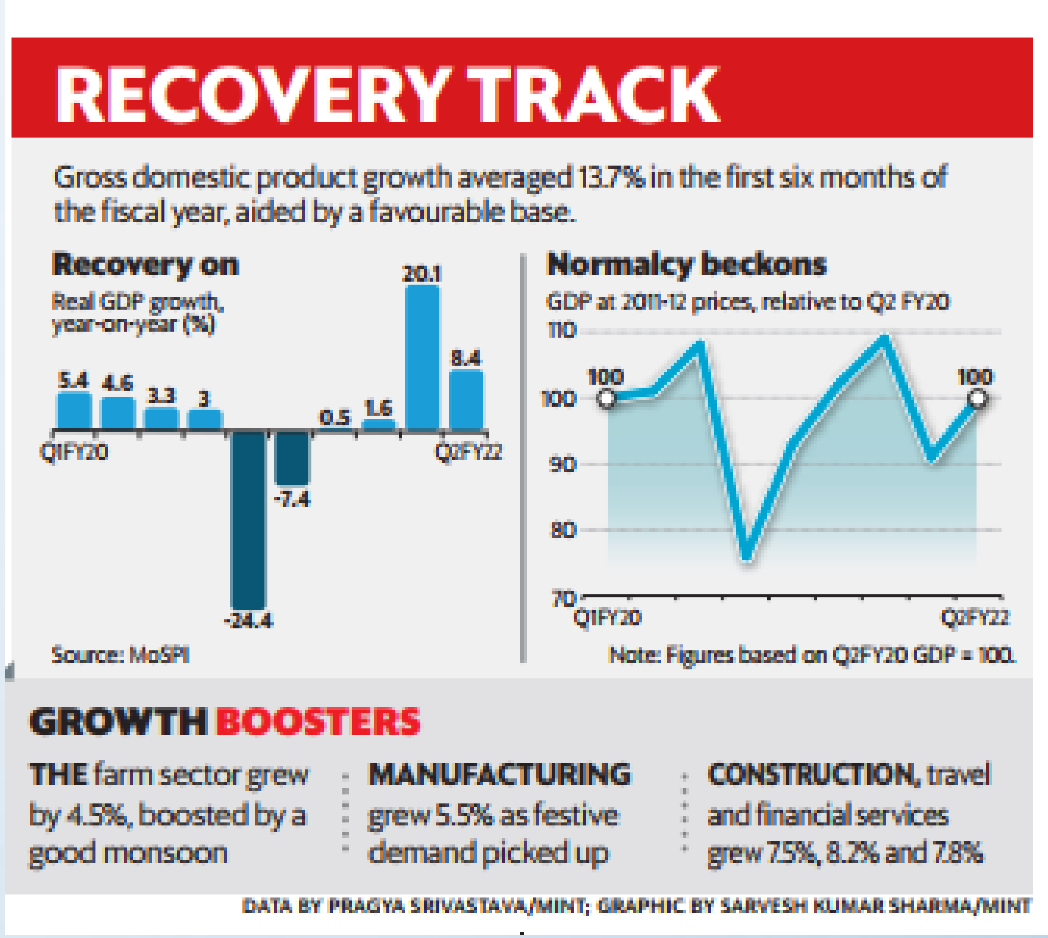
NEW DELHI

Source: Mint



# a. Managing Supply & Demand - Demand Levels

- Compare the 2019-20 : Q4 & 2021-22 : Q2 levels of demand
- These quarters represent pre-pandemic & post 2nd wave phases

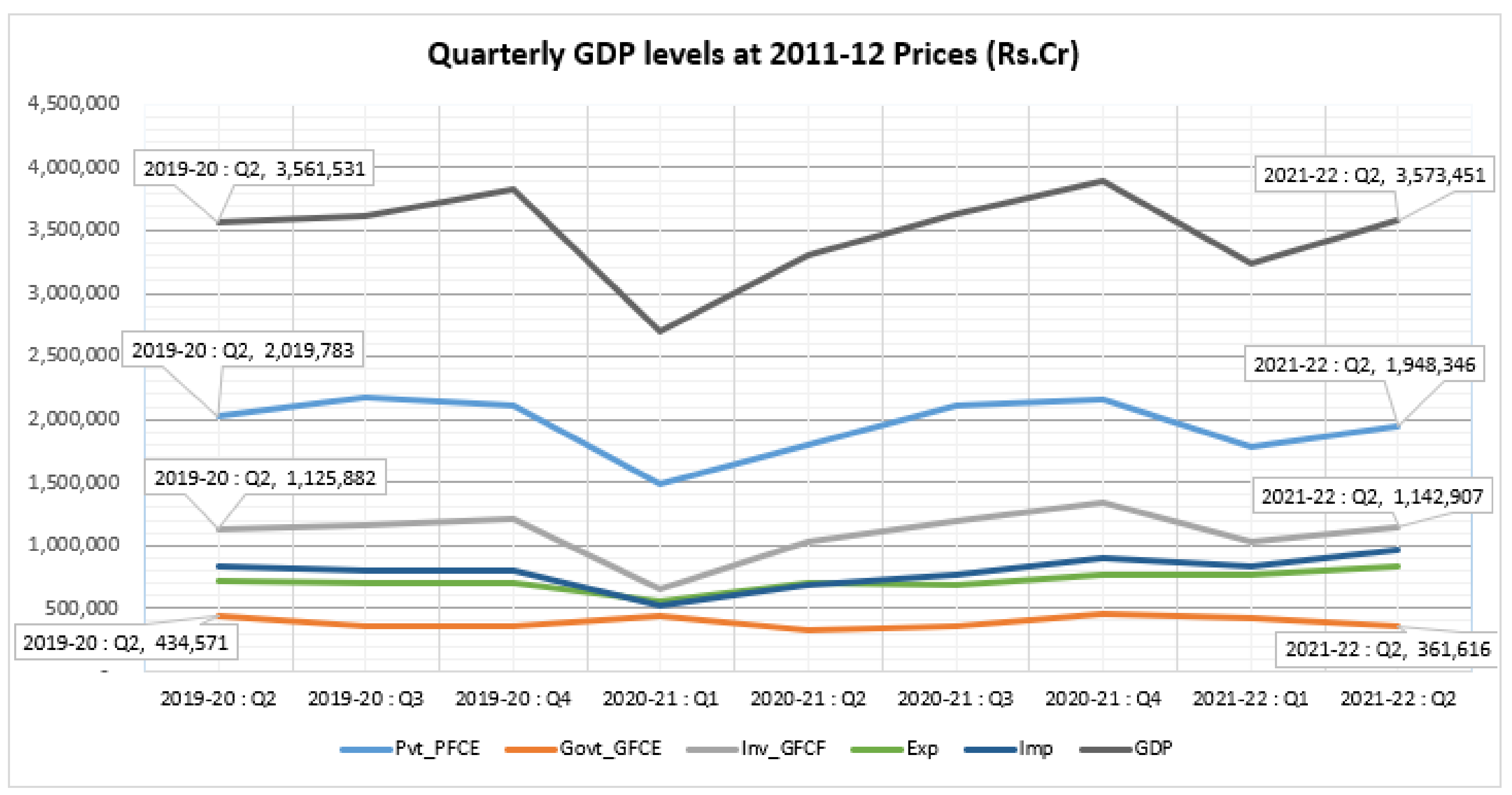
Quarterly Estimates of Expenditure components of GDP at 2011-12 Prices (Rs.Cr)

| | 2019-20 : Q2 | 2019-20 : Q3 | 2019-20 : Q4 | 2020-21 : Q1 | 2020-21 : Q2 | 2020-21 : Q3 | 2020-21 : Q4 | 2021-22 : Q1 | 2021-22 : Q2 |
|---|---|---|---|---|---|---|---|---|---|
| Pvt. Final Consumption Expenditure (PFCE) | 2,019,783 | 2,173,139 | 2,104,358 | 1,494,524 | 1,793,863 | 2,112,186 | 2,160,413 | 1,783,611 | 1,948,346 |
| Govt. Final Consumption Expenditure (GFCE) | 434,571 | 359,174 | 355,411 | 442,618 | 332,582 | 355,547 | 455,997 | 421,471 | 361,616 |
| Gross Fixed Capital Formation (GFCF) | 1,125,882 | 1,164,138 | 1,207,219 | 658,465 | 1,029,574 | 1,194,243 | 1,338,227 | 1,022,335 | 1,142,907 |
| Change in Stocks (CIS) | 39,414 | 38,146 | 41,218 | 26,611 | 40,726 | 40,701 | 46,238 | 38,817 | 41,844 |
| Valuables (Valuables) | 44,242 | 37,119 | 39,279 | 3,059 | 42,253 | 41,092 | 81,381 | 17,012 | 119,693 |
| Exports (Exp) | 710,581 | 707,760 | 701,307 | 552,524 | 696,182 | 682,938 | 762,743 | 768,589 | 832,804 |
| Imports (Imp) | 839,990 | 803,132 | 796,536 | 518,453 | 689,680 | 763,237 | 894,458 | 830,673 | 969,849 |
| Discrepancies (Disc) | 27,048 | -68,714 | 181,146 | 36,074 | 51,218 | -39,203 | -54,206 | 16,858 | 96,090 |
| **GDP** | **3,561,531** | **3,607,630** | **3,833,402** | **2,695,422** | **3,296,718** | **3,624,267** | **3,896,335** | **3,238,020** | **3,573,451** |

Data Source: MOSPI

# a. Managing Supply & Demand - Demand Levels (2)

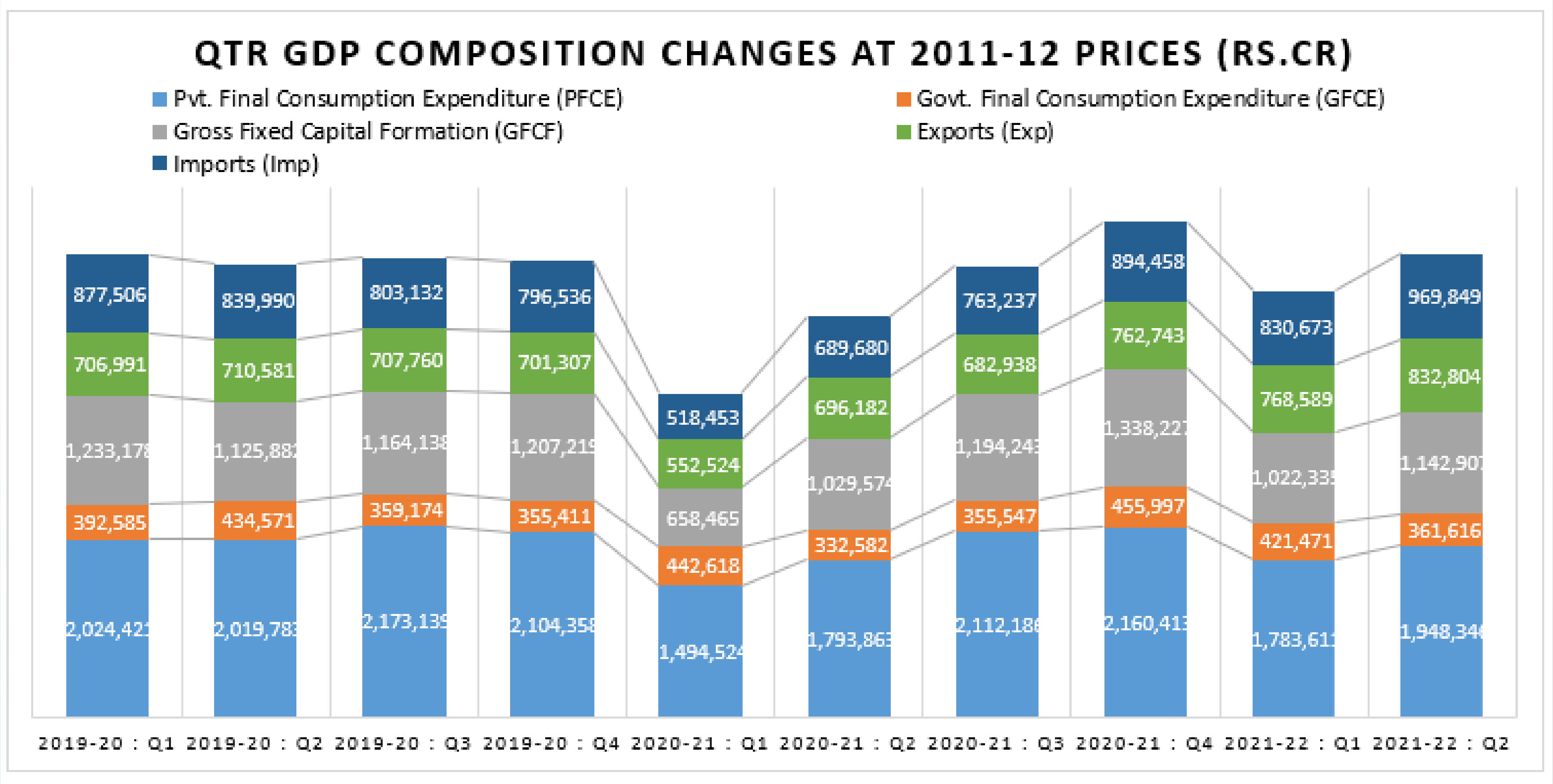
- Compare the pre Covid-19 and current demand levels




Data Source: MOSPI

# a. Managing Supply & Demand - Demand Composition

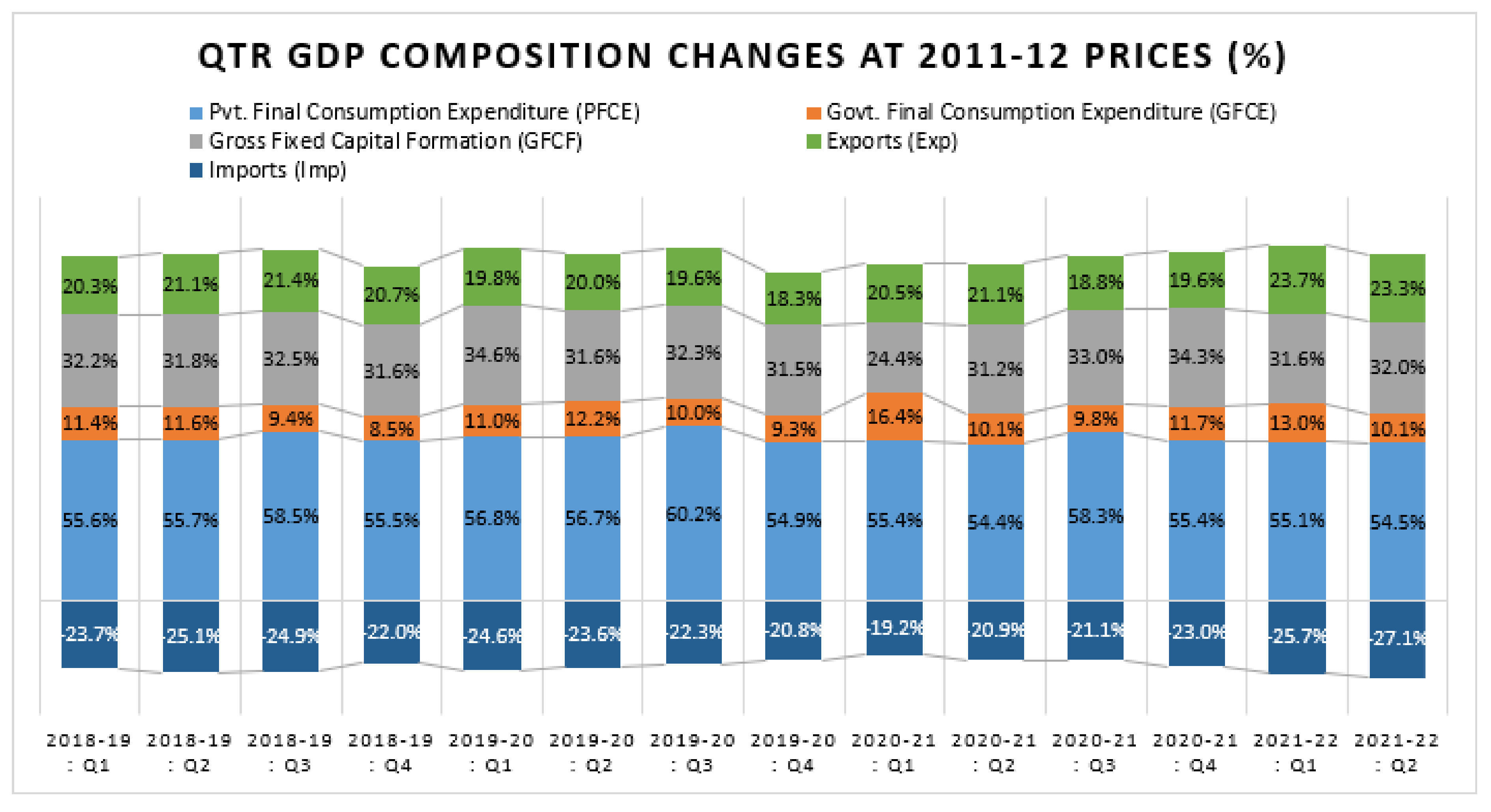
- Compare the shrinkage in composition, pre Covid-19(2019-20 : Q4) & latest quarter




Data Source: MOSPI

# a. Managing Supply & Demand - Demand Composition (2)

- Compare the shrinkage in % composition, pre Covid-19 & latest quarter






Data Source: MOSPI

# a. Managing Supply & Demand - Demand growth YoY

- Compare the decreases in the 2020-21 : Q1 & Q2 and the pull back in 2021-22 : Q1 & Q2

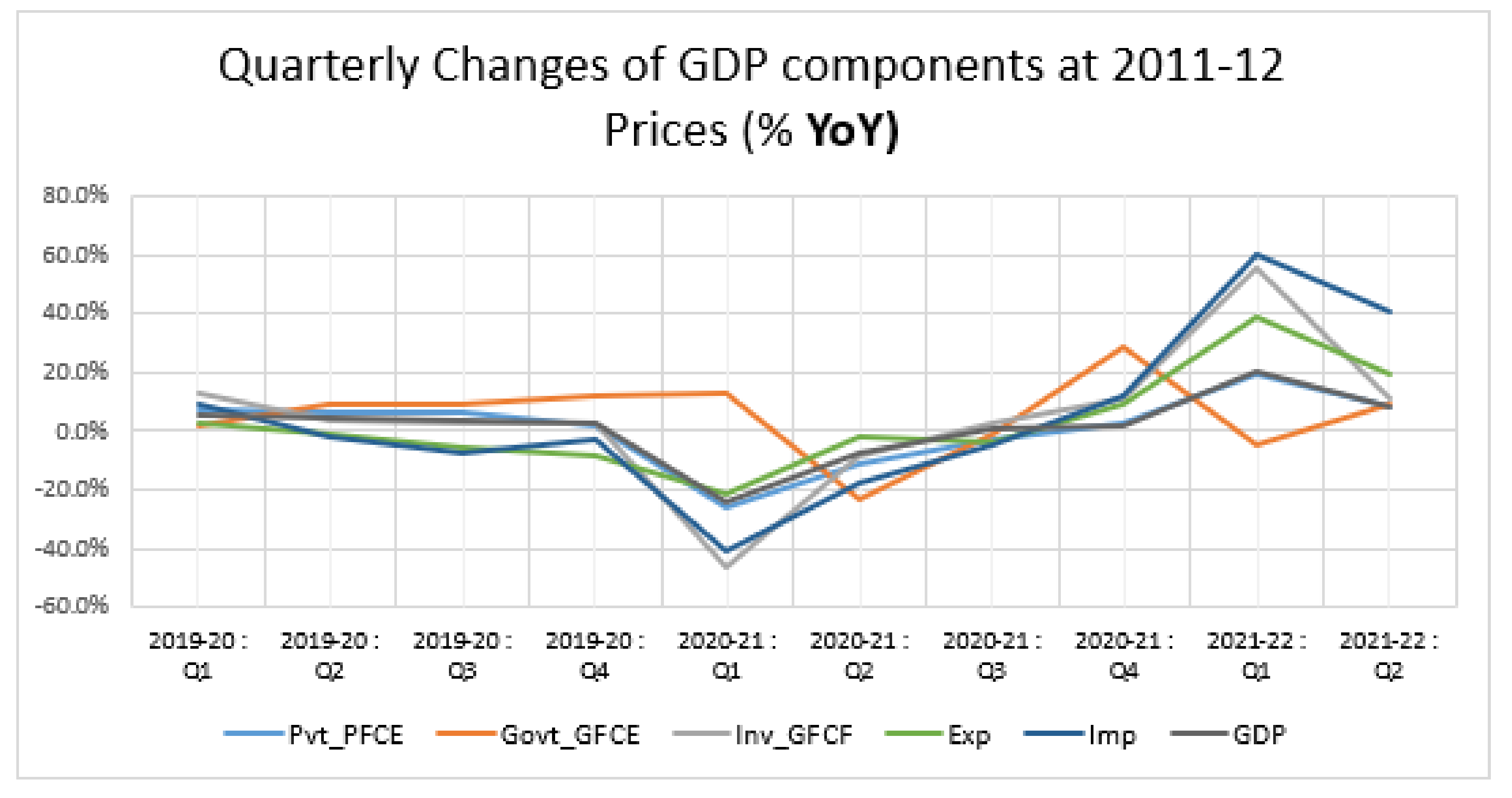
India Component GDP YoY changes

| | 2019-20 : Q1 | 2019-20 : Q2 | 2019-20 : Q3 | 2019-20 : Q4 | 2020-21 : Q1 | 2020-21 : Q2 | 2020-21 : Q3 | 2020-21 : Q4 | 2021-22 : Q1 | 2021-22 : Q2 |
|---|---|---|---|---|---|---|---|---|---|---|
| Pvt. Final Consumption Expenditure (Pvt PFCE) | 7.6% | 6.5% | 6.4% | 2.0% | -26.2% | -11.2% | -2.8% | 2.7% | 19.3% | 8.6% |
| Govt. Final Consumption Expenditure (Govt GFCE) | 1.8% | 9.6% | 8.9% | 12.1% | 12.7% | -23.5% | -1.0% | 28.3% | -4.8% | 8.7% |
| Gross Fixed Capital Formation (Inv GFCF) | 13.3% | 3.9% | 2.4% | 2.5% | -46.6% | -8.6% | 2.6% | 10.9% | 55.3% | 11.0% |
| Change in Stocks (CIS) | -37.8% | -40.0% | -40.0% | -40.8% | -32.8% | 3.3% | 6.7% | 12.2% | 45.9% | 2.7% |
| Valuables (Valuables) | -5.5% | -12.3% | -16.4% | -22.1% | -93.0% | -4.5% | 10.7% | 107.2% | 456.1% | 183.3% |
| Exports (Exp) | 3.0% | -1.3% | -5.4% | -8.8% | -21.8% | -2.0% | -3.5% | 8.8% | 39.1% | 19.6% |
| Imports (Imp) | 9.4% | -1.7% | -7.5% | -2.7% | -40.9% | -17.9% | -5.0% | 12.3% | 60.2% | 40.6% |
| Discrepancies (Disc) | -89.2% | -42.1% | 1871.1% | 94.4% | 917.9% | 89.4% | -42.9% | -129.9% | -53.3% | 87.6% |
| **GDP** | 5.4% | 4.6% | 3.3% | 3.0% | -24.4% | -7.4% | 0.5% | 1.6% | 20.1% | 8.4% |

Data Source: MOSPI

# a. Managing Supply & Demand - Demand growth YoY (2)

- Compare the decreases in the 2020-21 : Q1 & Q2 and the pull back in 2021-22 : Q1 & Q2




Data Source: MOSPI

# a. Managing Supply & Demand - Demand growth QoQ

- *We have noted the decreases in the 2020-21 : Q1 & Q2 & the pull back in 2021-22 : Q1 & Q2 seen in YoY growth table and chart*
- We get a different picture in the QoQ data. There was a 1st decrease in 2020-21 Q1 and a 2nd decrease in 2021-22 : Q1. This coincides with the pandemic impact in 2 waves & high frequency Google mobility data
- Q2 quarter pull backs 2020-21 & 2021-22 are also clearly visible

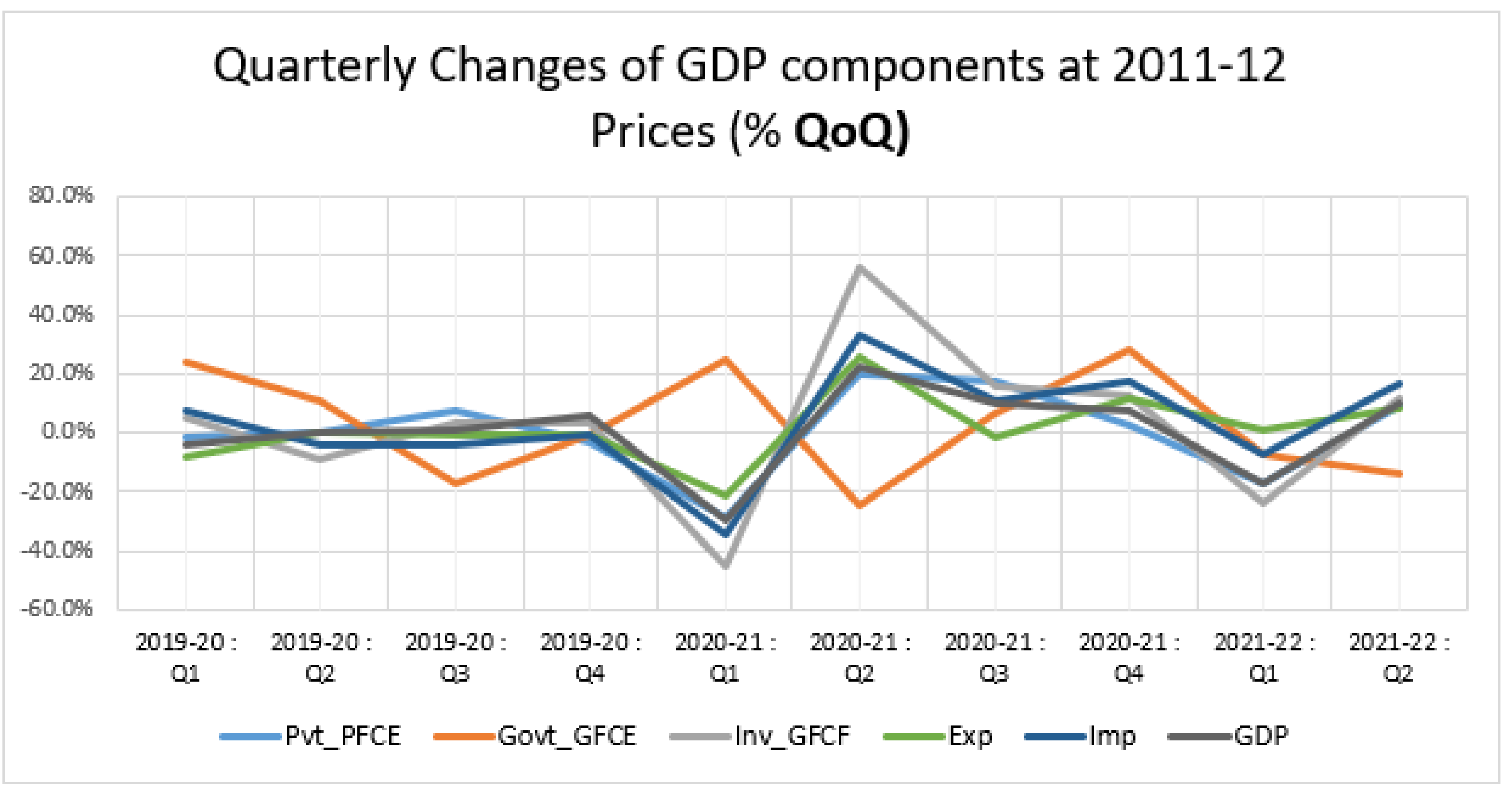
India Component GDP QoQ changes

| | 2019-20 : Q1 | 2019-20 : Q2 | 2019-20 : Q3 | 2019-20 : Q4 | 2020-21 : Q1 | 2020-21 : Q2 | 2020-21 : Q3 | 2020-21 : Q4 | 2021-22 : Q1 | 2021-22 : Q2 |
|---|---|---|---|---|---|---|---|---|---|---|
| Pvt. Final Consumption Expenditure (Pvt PFCE) | -1.9% | -0.2% | 7.6% | -3.2% | -29.0% | 20.0% | 17.7% | 2.3% | -17.4% | 9.2% |
| Govt. Final Consumption Expenditure (Govt GFCE) | 23.9% | 10.7% | -17.3% | -1.0% | 24.5% | -24.9% | 6.9% | 28.3% | -7.6% | -14.2% |
| Gross Fixed Capital Formation (Inv GFCF) | 4.7% | -8.7% | 3.4% | 3.7% | -45.5% | 56.4% | 16.0% | 12.1% | -23.6% | 11.8% |
| Change in Stocks (CIS) | -43.1% | -0.5% | -3.2% | 8.1% | -35.4% | 53.0% | -0.1% | 13.6% | -16.0% | 7.8% |
| Valuables (Valuables) | -12.9% | 0.8% | -16.1% | 5.8% | -92.2% | 1281.3% | -2.7% | 98.0% | -79.1% | 603.6% |
| Exports (Exp) | -8.0% | 0.5% | -0.4% | -0.9% | -21.2% | 26.0% | -1.9% | 11.7% | 0.8% | 8.4% |
| Imports (Imp) | 7.2% | -4.3% | -4.4% | -0.8% | -34.9% | 33.0% | 10.7% | 17.2% | -7.1% | 16.8% |
| Discrepancies (Disc) | -96.2% | 663.2% | -354.0% | -363.6% | -80.1% | 42.0% | -176.5% | 38.3% | -131.1% | 470.0% |
| **GDP** | -4.2% | -0.1% | 1.3% | 6.3% | -29.7% | 22.3% | 9.9% | 7.5% | -16.9% | 10.4% |

Data Source: MOSPI

# a. Managing Supply & Demand - Demand growth QoQ (2)

- *We have noted the decreases in the 2020-21 : Q1 & Q2 and the pull back in 2021-22 : Q1 & Q2 seen in YoY growth table and chart*
- We get a different picture in the QoQ data. There was a 1st decrease in 2020-21 : Q1 and a 2nd decrease in 2021-22 : Q1. This coincides with the pandemic impact in 2 waves & high frequency Google mobility data
- Q2 quarter pull backs in 2020-21 & 2021-22 are also clearly visible




Data Source: MOSPI

# a. Managing Supply & Demand - Indexed Demand

- Demand for various segment indexed to pre covid-19 quarter i.e., 2019-20 : Q4, shown in percentile based coloration
- Strong & secular recovery in 2020-21 : Q4, dissipated in 2021-22 : Q1

Quarterly Estimates of Expenditure components of GDP at 2011-12 Prices (Index)

| | 2019-20 : Q4 | 2020-21 : Q1 | 2020-21 : Q2 | 2020-21 : Q3 | 2020-21 : Q4 | 2021-22 : Q1 | 2021-22 : Q2 |
|---|---|---|---|---|---|---|---|
| Pvt. Final Consumption Expenditure (PFCE) | 100 | 71.0 | 85.2 | 100.4 | 102.7 | 84.8 | 92.6 |
| Govt. Final Consumption Expenditure (GFCE) | 100 | 124.5 | 93.6 | 100.0 | 128.3 | 118.6 | 101.7 |
| Gross Fixed Capital Formation (GFCF) | 100 | 54.5 | 85.3 | 98.9 | 110.9 | 84.7 | 94.7 |
| Change in Stocks (CIS) | 100 | 64.6 | 98.8 | 98.7 | 112.2 | 94.2 | 101.5 |
| Valuables (Valuables) | 100 | 7.8 | 107.6 | 104.6 | 207.2 | 43.3 | 304.7 |
| Exports (Exp) | 100 | 78.8 | 99.3 | 97.4 | 108.8 | 109.6 | 118.8 |
| Imports (Imp) | 100 | 65.1 | 86.6 | 95.8 | 112.3 | 104.3 | 121.8 |
| **GDP** | 100 | 70.3 | 86.0 | 94.5 | 101.6 | 84.5 | 93.2 |

Data Source: MOSPI

*Dark Green stands for the highest percentile, Bright Yellow for the median (2019-20 – Q4) and Dark Red for the lowest percentile*

# a. Managing Supply & Demand - Supply Levels

- Compare 2020-21 : Q2 and 2021-22 : Q2 levels for Mfg. Construction, Trade & Travel+
- Agri bump in 2020-21 : Q4
- Finance, Services bump in 2021-22 : Q1 & Q2
- Compare levels for pre & post 2nd wave, 2019-20 : Q4 and 2021-22 : Q2

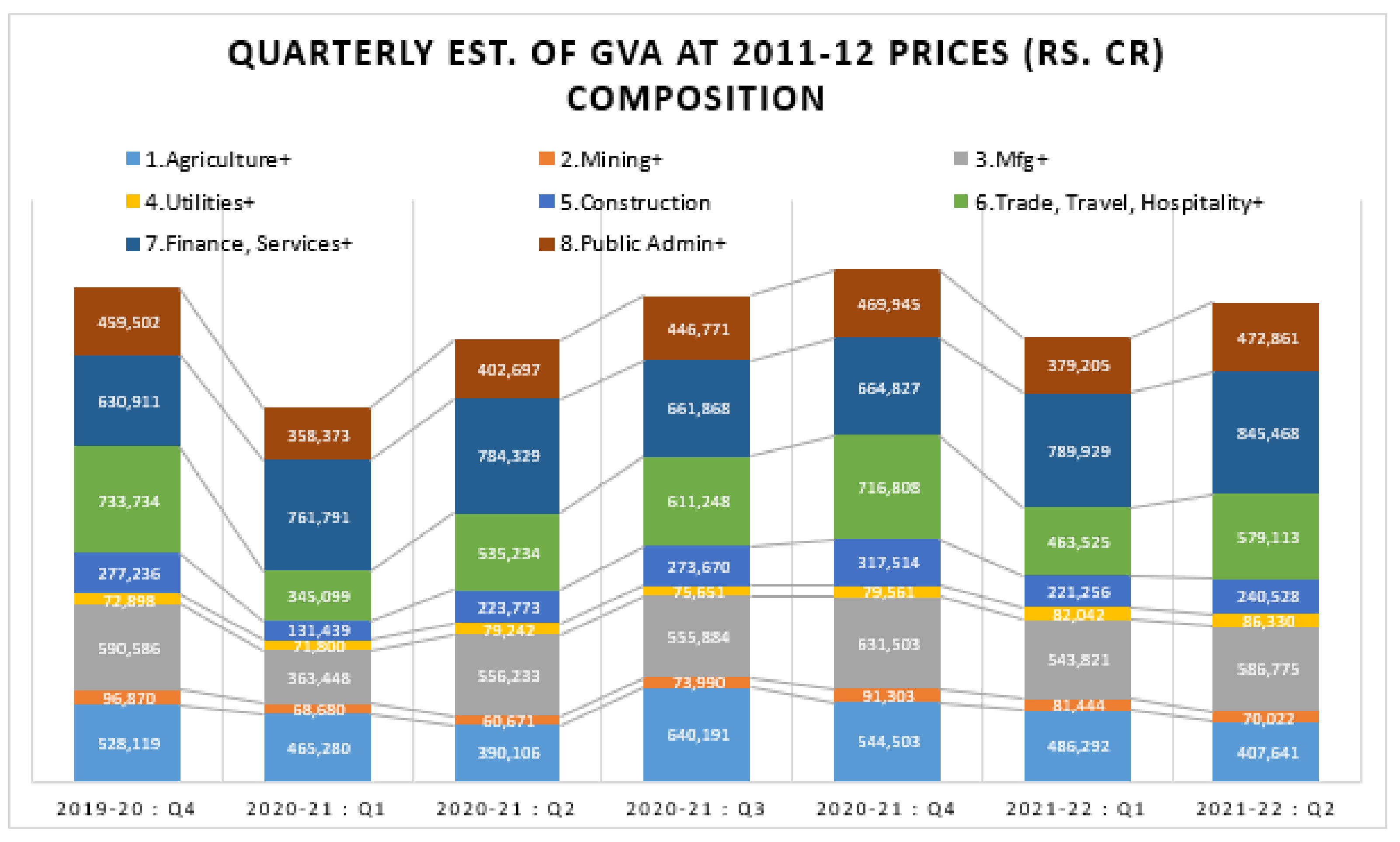
Quarterly Estimates of GVA at 2011-12 Prices (Rs.Cr)

| | 2019-20 : Q4 | 2020-21 : Q1 | 2020-21 : Q2 | 2020-21 : Q3 | 2020-21 : Q4 | 2021-22 : Q1 | 2021-22 : Q2 |
|---|---|---|---|---|---|---|---|
| 1.Agriculture+ | 528,119 | 465,280 | 390,106 | 640,191 | 544,503 | 486,292 | 407,641 |
| 2.Mining+ | 96,870 | 68,680 | 60,671 | 73,990 | 91,303 | 81,444 | 70,022 |
| 3.Mfg+ | 590,586 | 363,448 | 556,233 | 555,884 | 631,503 | 543,821 | 586,775 |
| 4.Utilities+ | 72,898 | 71,800 | 79,242 | 75,651 | 79,561 | 82,042 | 86,330 |
| 5.Construction | 277,236 | 131,439 | 223,773 | 273,670 | 317,514 | 221,256 | 240,528 |
| 6.Trade, Travel, Hospitality+ | 733,734 | 345,099 | 535,234 | 611,248 | 716,808 | 463,525 | 579,113 |
| 7.Finance, Services+ | 630,911 | 761,791 | 784,329 | 661,868 | 664,827 | 789,929 | 845,468 |
| 8.Public Admin+ | 459,502 | 358,373 | 402,697 | 446,771 | 469,945 | 379,205 | 472,861 |
| **GVA at Basic Prices** | **3,389,856** | **2,565,910** | **3,032,285** | **3,339,273** | **3,515,964** | **3,047,514** | **3,288,738** |

Data Source: MOSPI

# a. Managing Supply & Demand - Supply Levels (2)

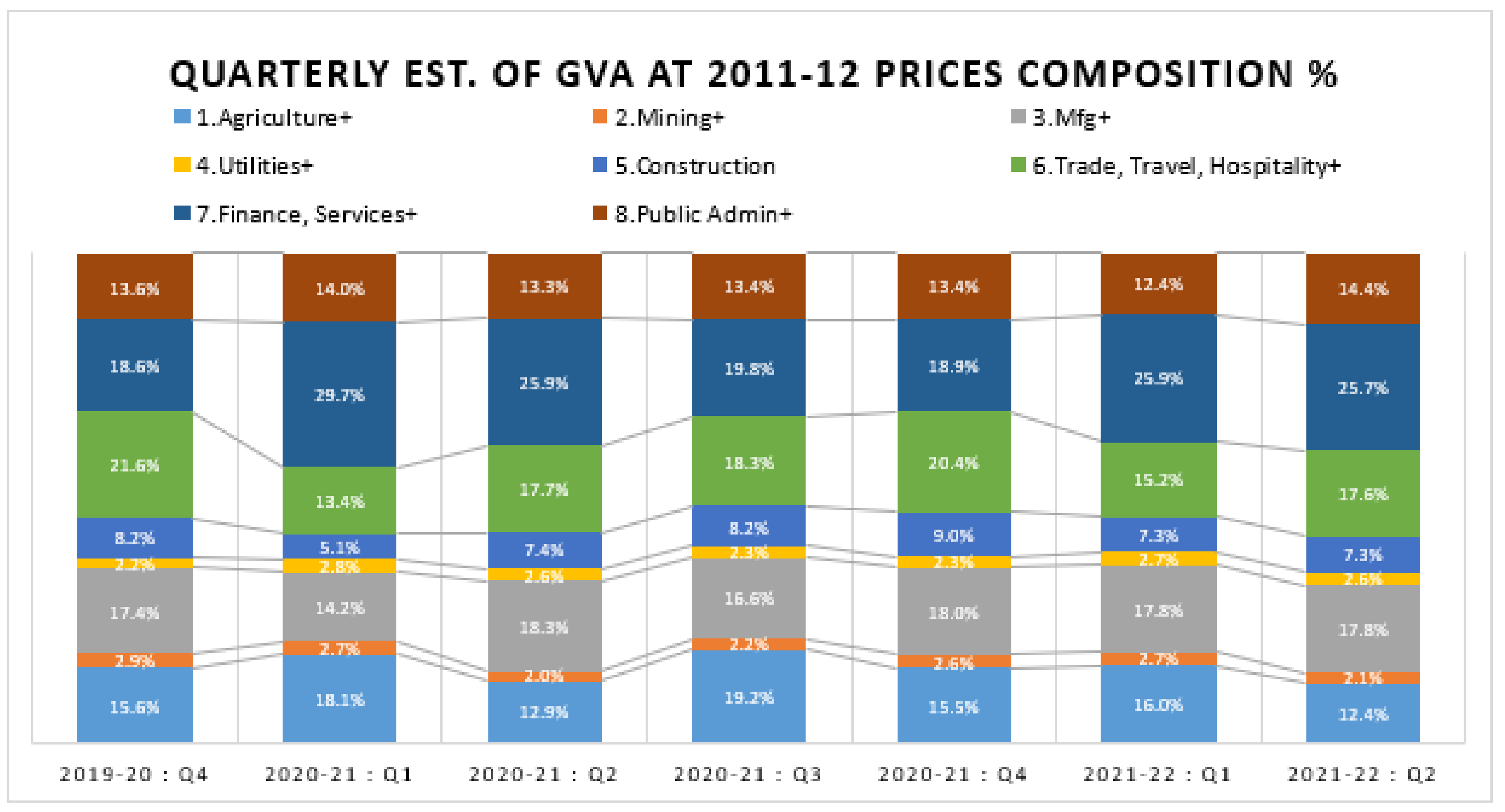
- Compare 2019-20 : Q4 and 2021-22 : Q2 levels, for pre and post 2nd wave stages




Data Source: MOSPI

# a. Managing Supply & Demand - Supply Levels (3)

- Compare 2019-20 : Q4 and 2021-22 : Q2 composition %, for pre and post 2nd wave stage




Data Source: MOSPI

# a. Managing Supply & Demand - Supply Levels growth YoY

- Compare drops in 2020-21 : Q1 & hikes in 2021-22 : Q1, latter showing the base effect

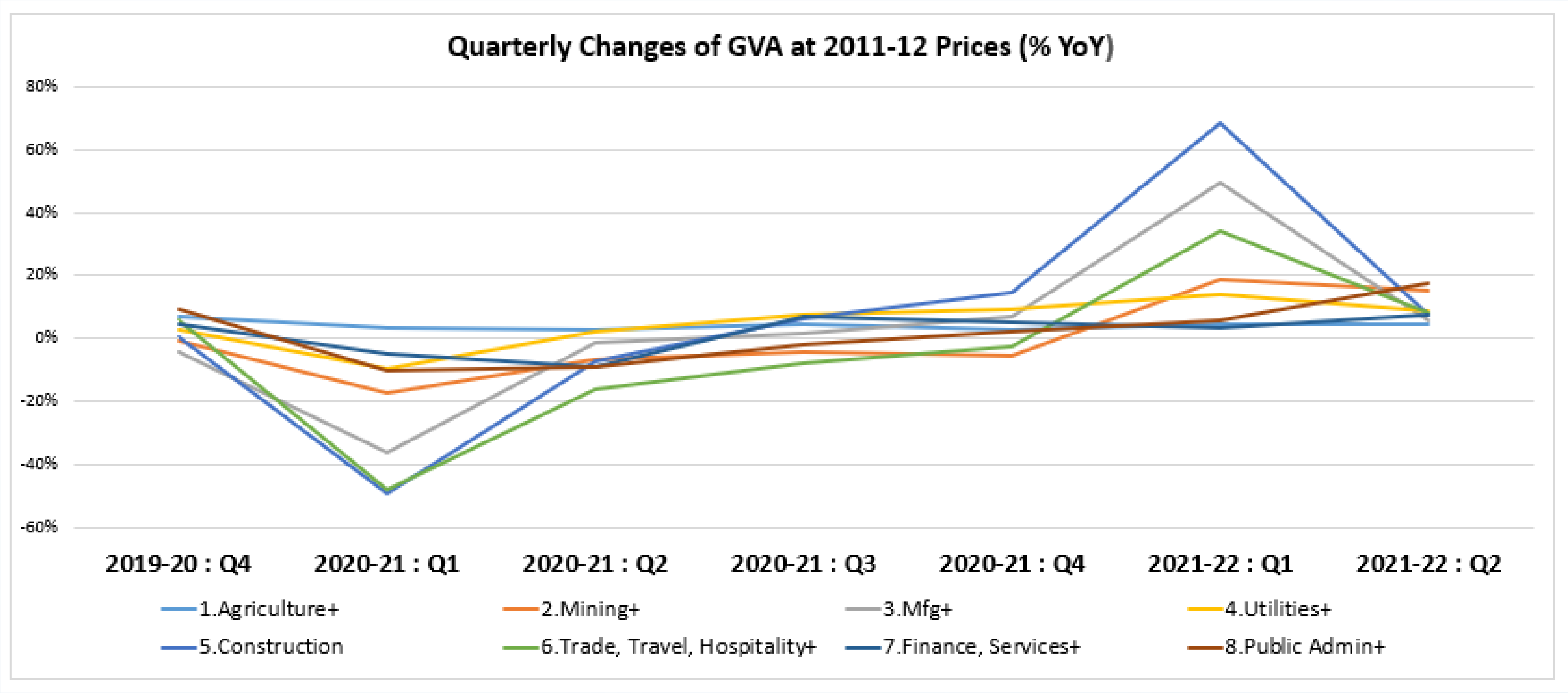
Quarterly Estimates of GVA at 2011-12 Prices (Rs.Cr) YOY

| | 2019-20 : Q4 | 2020-21 : Q1 | 2020-21 : Q2 | 2020-21 : Q3 | 2020-21 : Q4 | 2021-22 : Q1 | 2021-22 : Q2 |
|---|---|---|---|---|---|---|---|
| 1.Agriculture+ | 6.8% | 3.5% | 3.0% | 4.5% | 3.1% | 4.5% | 4.5% |
| 2.Mining+ | -0.9% | -17.2% | -6.5% | -4.4% | -5.7% | 18.6% | 15.4% |
| 3.Mfg+ | -4.2% | -36.0% | -1.5% | 1.7% | 6.9% | 49.6% | 5.5% |
| 4.Utilities+ | 2.6% | -9.9% | 2.3% | 7.3% | 9.1% | 14.3% | 8.9% |
| 5.Construction | 0.7% | -49.5% | -7.2% | 6.5% | 14.5% | 68.3% | 7.5% |
| 6.Trade, Travel, Hospitality+ | 5.7% | -48.1% | -16.1% | -7.9% | -2.3% | 34.3% | 8.2% |
| 7.Finance, Services+ | 4.9% | -5.0% | -9.1% | 6.7% | 5.4% | 3.7% | 7.8% |
| 8.Public Admin+ | 9.6% | -10.2% | -9.2% | -2.2% | 2.3% | 5.8% | 17.4% |
| GVA at Basic Prices | 3.7% | -22.4% | -7.3% | 1.0% | 3.7% | 18.8% | 8.5% |

Data Source: MOSPI

# a. Managing Supply & Demand - Supply Levels growth YoY (2)

- Compare drops in 2020-21 : Q1 & hikes in 2021-22 : Q1




Data Source: MOSPI

# a. Managing Supply & Demand - Supply Levels growth QoQ

- Compare drops in 2020-21 : Q1 & 2021-22 : Q1, showing the fall in supply

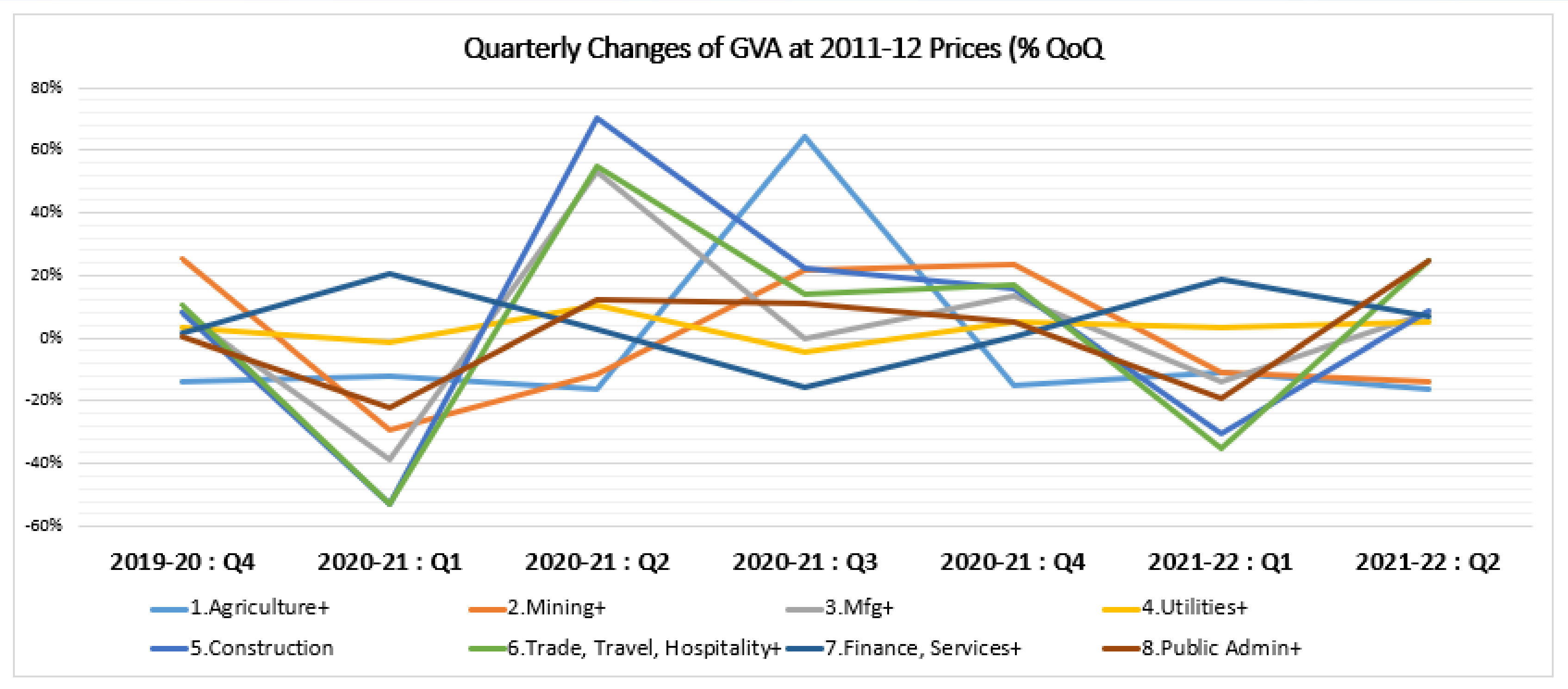
Quarterly Estimates of GVA at 2011-12 Prices (Rs.Cr) QOQ

| | 2019-20 : Q4 | 2020-21 : Q1 | 2020-21 : Q2 | 2020-21 : Q3 | 2020-21 : Q4 | 2021-22 : Q1 | 2021-22 : Q2 |
|---|---|---|---|---|---|---|---|
| 1.Agriculture+ | -13.8% | -11.9% | -16.2% | 64.1% | -14.9% | -10.7% | -16.2% |
| 2.Mining+ | 25.1% | -29.1% | -11.7% | 22.0% | 23.4% | -10.8% | -14.0% |
| 3.Mfg+ | 8.1% | -38.5% | 53.0% | -0.1% | 13.6% | -13.9% | 7.9% |
| 4.Utilities+ | 3.4% | -1.5% | 10.4% | -4.5% | 5.2% | 3.1% | 5.2% |
| 5.Construction | 7.9% | -52.6% | 70.2% | 22.3% | 16.0% | -30.3% | 8.7% |
| 6.Trade, Travel, Hospitality+ | 10.6% | -53.0% | 55.1% | 14.2% | 17.3% | -35.3% | 24.9% |
| 7.Finance, Services+ | 1.7% | 20.7% | 3.0% | -15.6% | 0.4% | 18.8% | 7.0% |
| 8.Public Admin+ | 0.6% | -22.0% | 12.4% | 10.9% | 5.2% | -19.3% | 24.7% |
| **GVA at Basic Prices** | 2.6% | -24.3% | 18.2% | 10.1% | 5.3% | -13.3% | 7.9% |

Data Source: MOSPI

# a. Managing Supply & Demand - Supply Levels growth QoQ (2)

- Compare drops in 2020-21 : Q1 & 2021-22 : Q1




Data Source: MOSPI

# a. Managing Supply & Demand - Indexed Supply

- Supply for various segments indexed to pre covid-19 quarter. i.e., 2019-20 : Q4 , shown in percentile based colour grades
- Strong & secular recovery in 2020-21 : Q4, dissipated by the 2nd wave

Quarterly Estimates of GVA at 2011-12 Prices (Index)

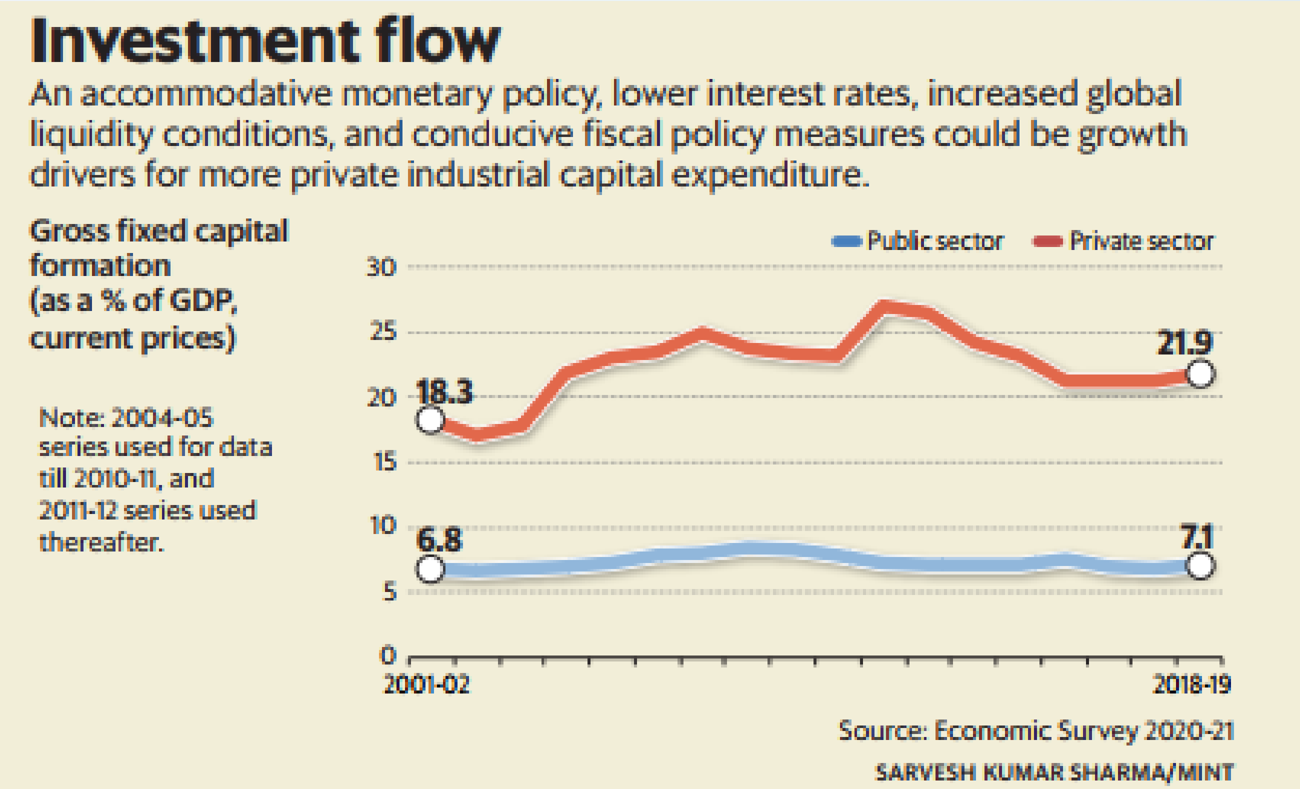
| | 2019-20 : Q4 | 2020-21 : Q1 | 2020-21 : Q2 | 2020-21 : Q3 | 2020-21 : Q4 | 2021-22 : Q1 | 2021-22 : Q2 |
|---|---|---|---|---|---|---|---|
| 1.Agriculture+ | 100 | 88.1 | 73.9 | 121.2 | 103.1 | 92.1 | 77.2 |
| 2.Mining+ | 100 | 70.9 | 62.6 | 76.4 | 94.3 | 84.1 | 72.3 |
| 3.Mfg+ | 100 | 61.5 | 94.2 | 94.1 | 106.9 | 92.1 | 99.4 |
| 4.Utilities+ | 100 | 98.5 | 108.7 | 103.8 | 109.1 | 112.5 | 118.4 |
| 5.Construction | 100 | 47.4 | 80.7 | 98.7 | 114.5 | 79.8 | 86.8 |
| 6.Trade, Travel, Hospitality+ | 100 | 47.0 | 72.9 | 83.3 | 97.7 | 63.2 | 78.9 |
| 7.Finance, Services+ | 100 | 120.7 | 124.3 | 104.9 | 105.4 | 125.2 | 134.0 |
| 8.Public Admin+ | 100 | 78.0 | 87.6 | 97.2 | 102.3 | 82.5 | 102.9 |
| GVA at Basic Prices | 100 | 75.7 | 89.5 | 98.5 | 103.7 | 89.9 | 97.0 |

Data Source: MOSPI

*Dark Green stands for the highest percentile, Bright Yellow for the median (2019-20 – Q4) and Dark Red for the lowest percentile*

# a. Managing Supply & Demand - Investment

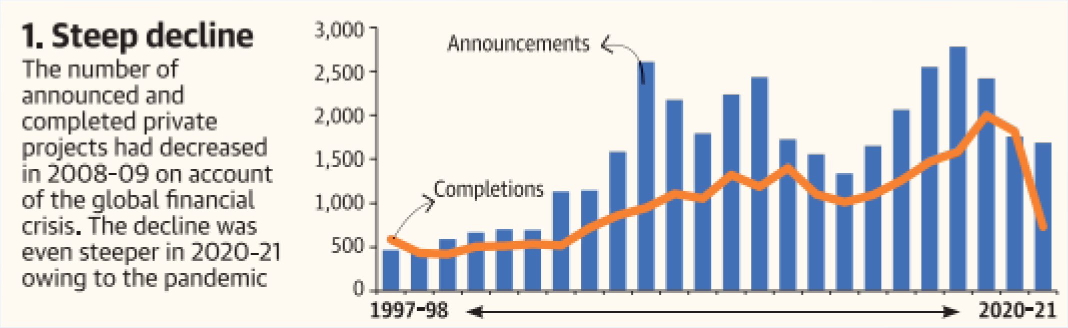
- Investment formation have been flat in the GDP data presented
- Capacity utilisation in industry ranging from 60-69%

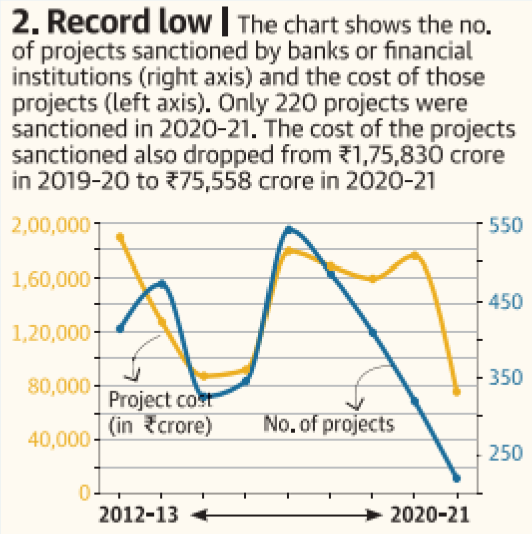


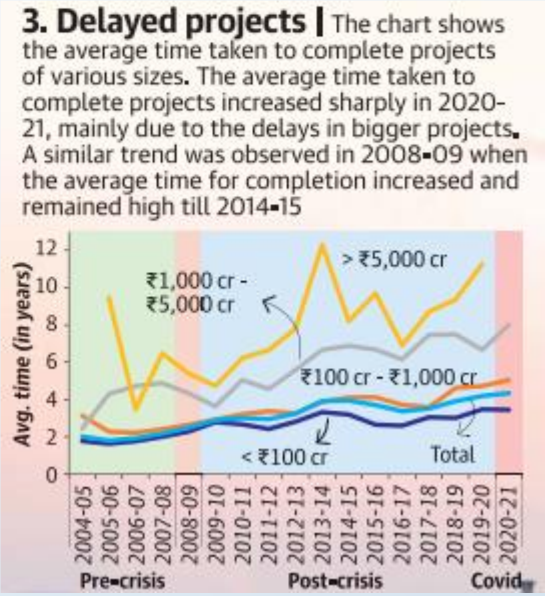

Source: Mint

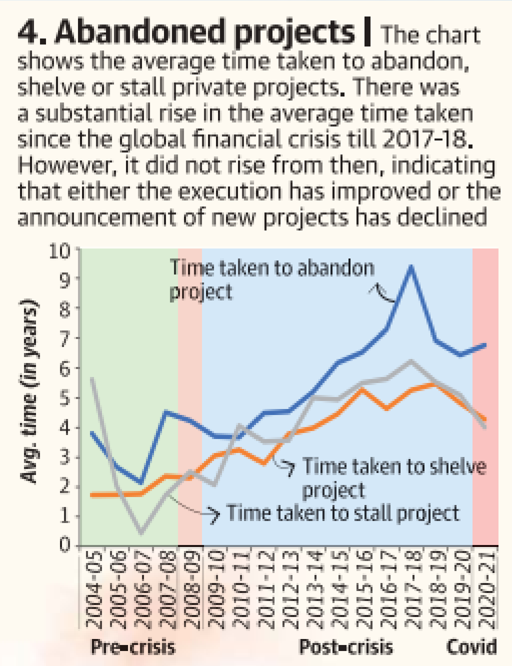
# a. Managing Supply & Demand – Investment (2)

- Why is investment formation struggling ?



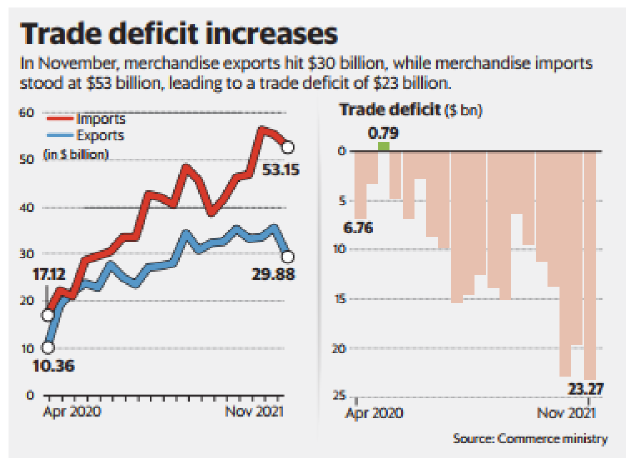



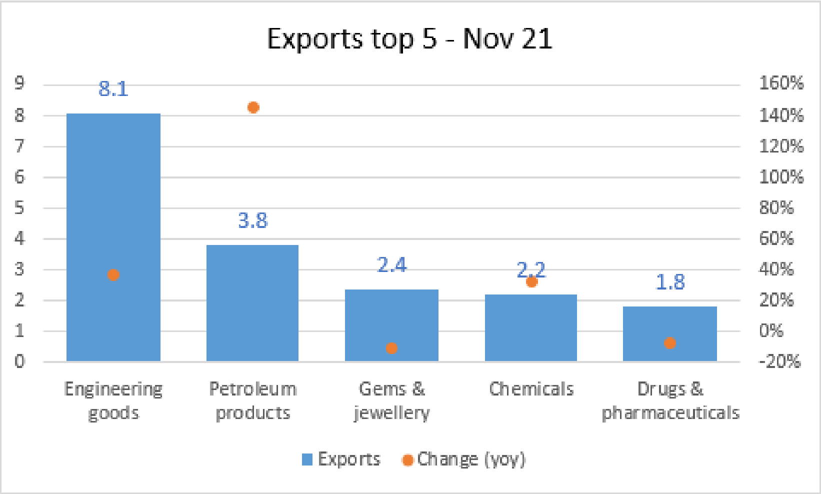

Source: The Hindu

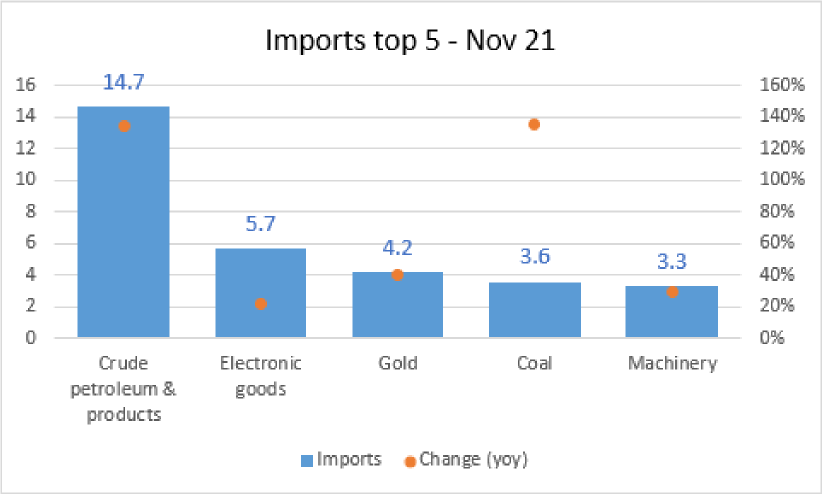
# a. Managing Supply & Demand - Trade

- Sharp growth in Trade post crisis
- Pull back in Nov 2021
- Challenges of supply bottlenecks, potential Covid 3rd wave
- Changes in export & import profile




Source: Mint




November 2021 Commerce Ministry

# a. Managing Supply & Demand - Review

- Private Consumption and Capital Formation in FY 21-22 Q2 had not surpassed pre-pandemic levels seen in FY 19-20 Q4
- GDP components: Year on Year (YoY demand changes show different pattern to Quarter on Quarter (QoQ) demand changes. QoQ changes data did not show a recession (2 quarter decline), YoY did. The YoY changes demonstrates the 'ghosting' impact of a base year in the time series
- GDP components : Quarter on Quarter demand impact seen in 2 quarters, coincides with pandemic lockdown & impact, matching Google mobility data
- Supply has been restored or surpassed compared to pre-pandemic levels in Manufacturing, Utilities and Finance & other services. Agriculture bump in 2020-21 : Q4 could have been due to reverse migration & income supplementation during lock down. Aggregate supply levels are lower as yet.
- Investments have been subdued despite govt spending, due to several reasons including low capacity utilisation
- Trade has recovered with new challenges in the horizon, despite bottlenecks. Composition of trade has altered

Section

# b. Inflation

- Inflation (What is it ?)
- Inflation Reports

# b. Inflation

- 5 different measures of inflation.
- WPI, CPI for industrial workers (CPI-IW), CPI for agricultural labourers (CPI-AL), CPI for rural labourers (CPI-RL), & CPI for urban non-manual employees (CPI-UNME).
- WPI measures the average prices in the wholesale market
- CPI is the average price that any consumer pays to meet his/her demand.
- Average wholesale prices & the consumer prices may differ because of composition, taxes, distribution, and transportation costs.
- Data on WPI are supplied by the Ministry of Commerce and Industry
- Data on CPI are supplied by the Labour Bureau, Government of India.

# b. Inflation (2)

- CPI covers around 260 items. Approximately 160,000 retail price quotes are obtained each month from 16,545 outlets and selected open markets.
- CPI-IW includes six sub-indices—clothing, food, fuel and light, housing, tobacco and intoxicants, and miscellaneous items (such as hair dressing, toilet accessories, clocks and watches, etc.).
- CPI-AL and CPIRL are published with only five sub-indices and exclude housing.
- CPI also includes six subcategories of services.

# b. Inflation (3)

- WPI has a smaller share of food items - only 27 % - and this includes manufactured food items.
- Fuel has a larger weight in WPI (14.2 %) than its share under different measures of CPI (ranging from 5.5 to 8.4 %).
- Prices of service items are not included in WPI whereas they are included while calculating CPI.

# b. Inflation (4)

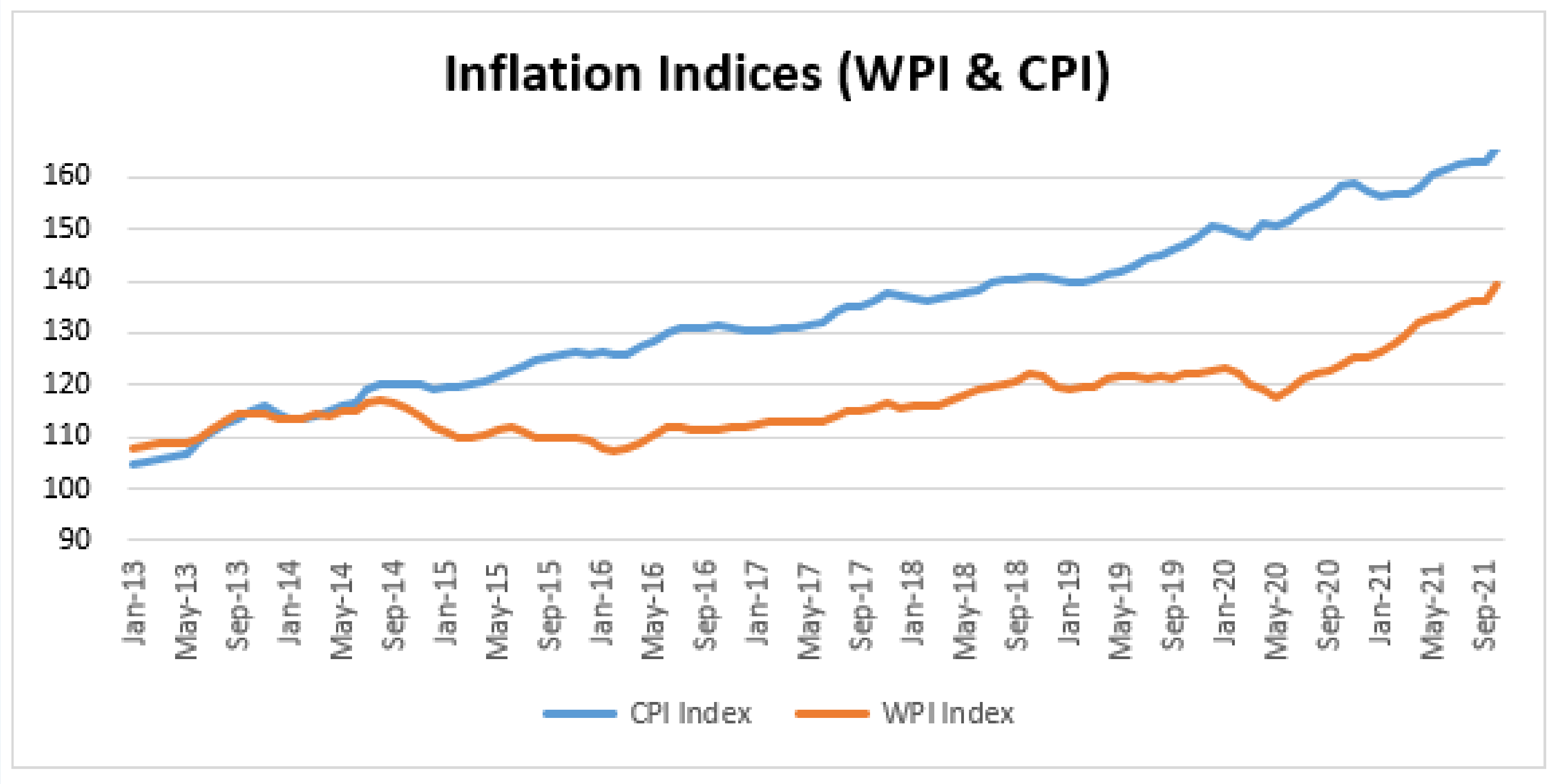
- 2 more measures of inflation.
- GDP deflator &  producer price index (PPI).
- GDP deflator is the most comprehensive measure of inflation as it is the ratio of GDP at current prices to constant prices.
- On a quarterly basis, GDP deflator also reflects the extent of services inflation.
- PPI is more like WPI but with a difference. WPI reflects producers' average cost of production including mark-ups and taxes, whereas PPI measures the wholesale price that producers pay for procuring primary, intermediary, finished, and services input without taxes.
- PPI usually covers industrial manufacturing sectors & services such as public utilities (electricity, gas, communication, etc.)

# b. Inflation (5)

- Core inflation refers to measuring inflation excluding the seasonal components and more volatile consumption items such as food, fuel, and minerals.
- Agricultural produce (>55%)  depends upon rainfall, fluctuations in weather conditions can contribute to volatility in agricultural prices. The measure of inflation that does not consider these seasonal and volatile components is known as core inflation.
- Headline inflation is the raw inflation computation without any adjustments

# b. Inflation reports

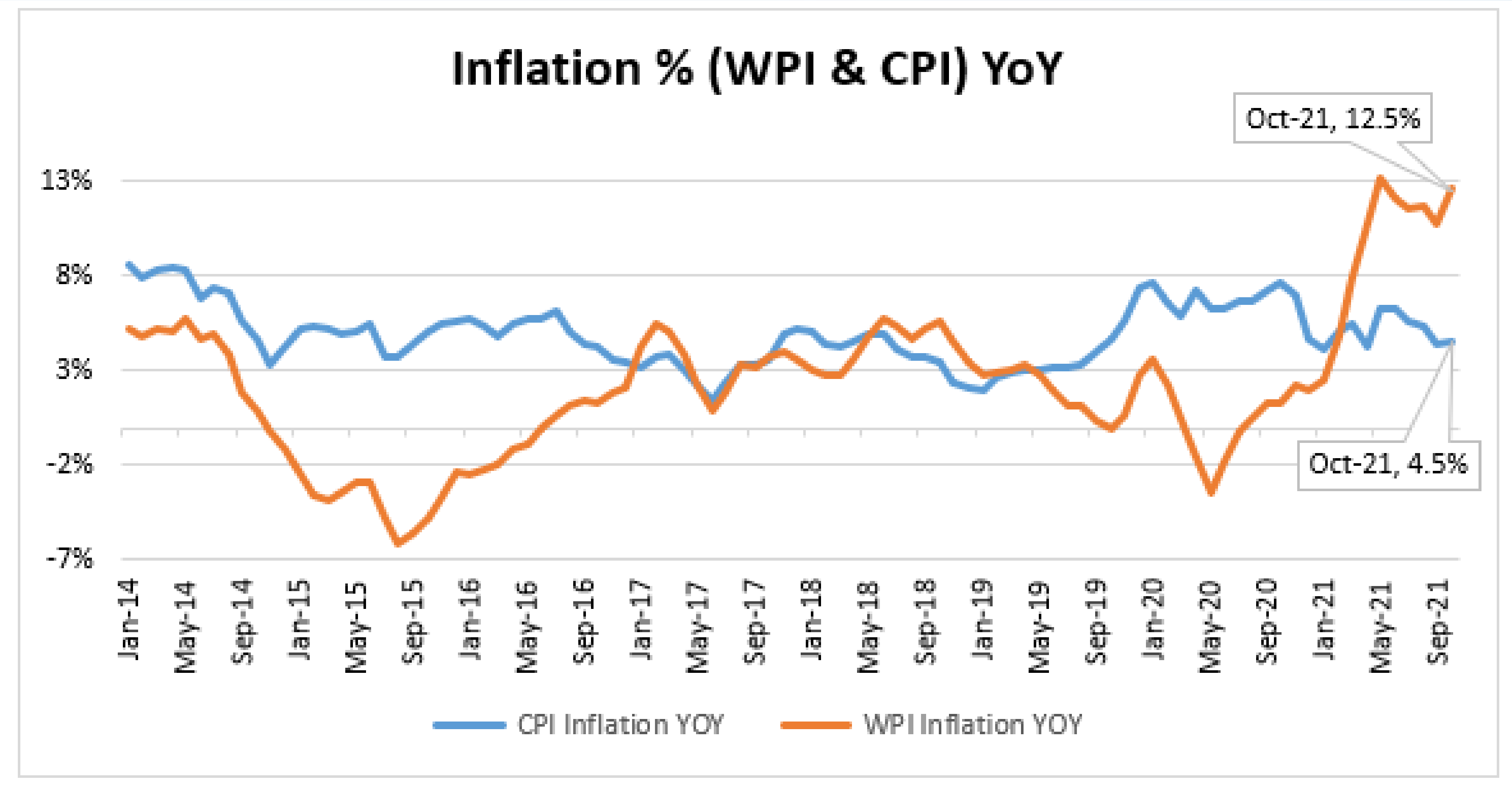
- CPI & WPI levels – apparently divergent & similar patterns




Data Source: RBI

# b. Inflation reports (2)

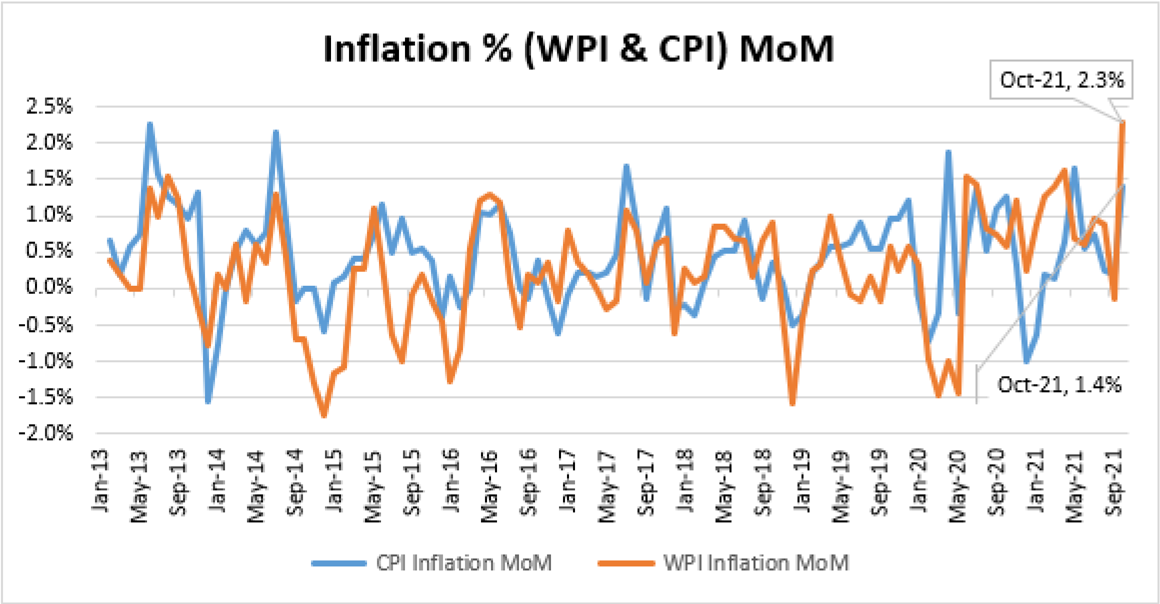
- CPI & WPI - Inflation % Year-on-Year - Diverging patterns

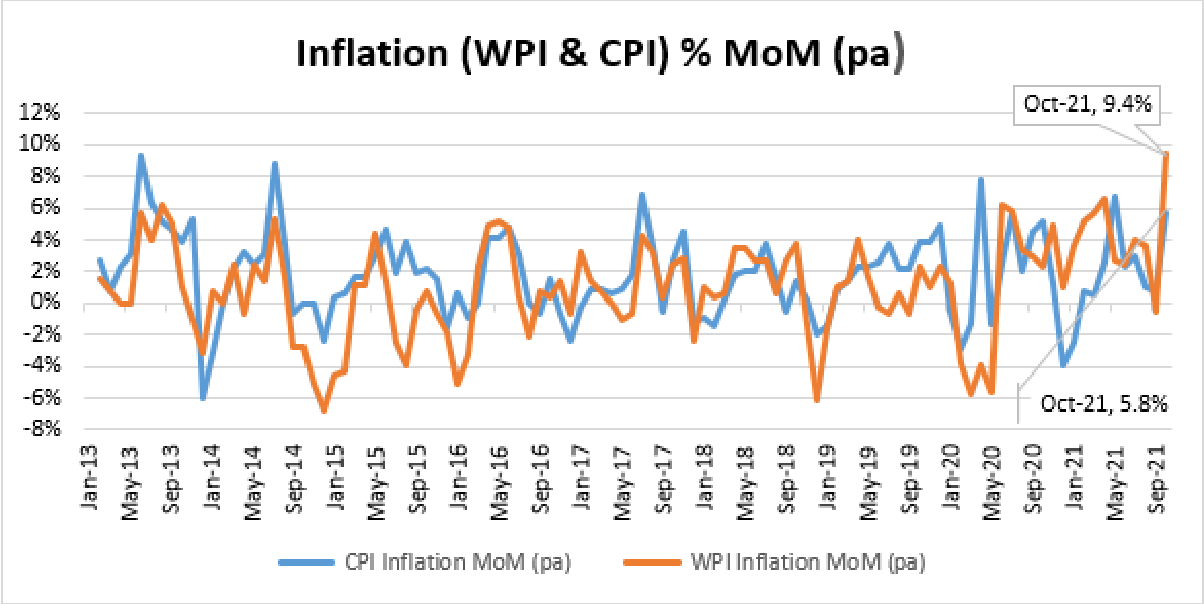



Data Source: RBI

# b. Inflation reports (3)

- CPI & WPI levels - Inflation % - Month-on-Month & Month-on-Month annualised
- Volatility divergent at some times, mirrored at other times

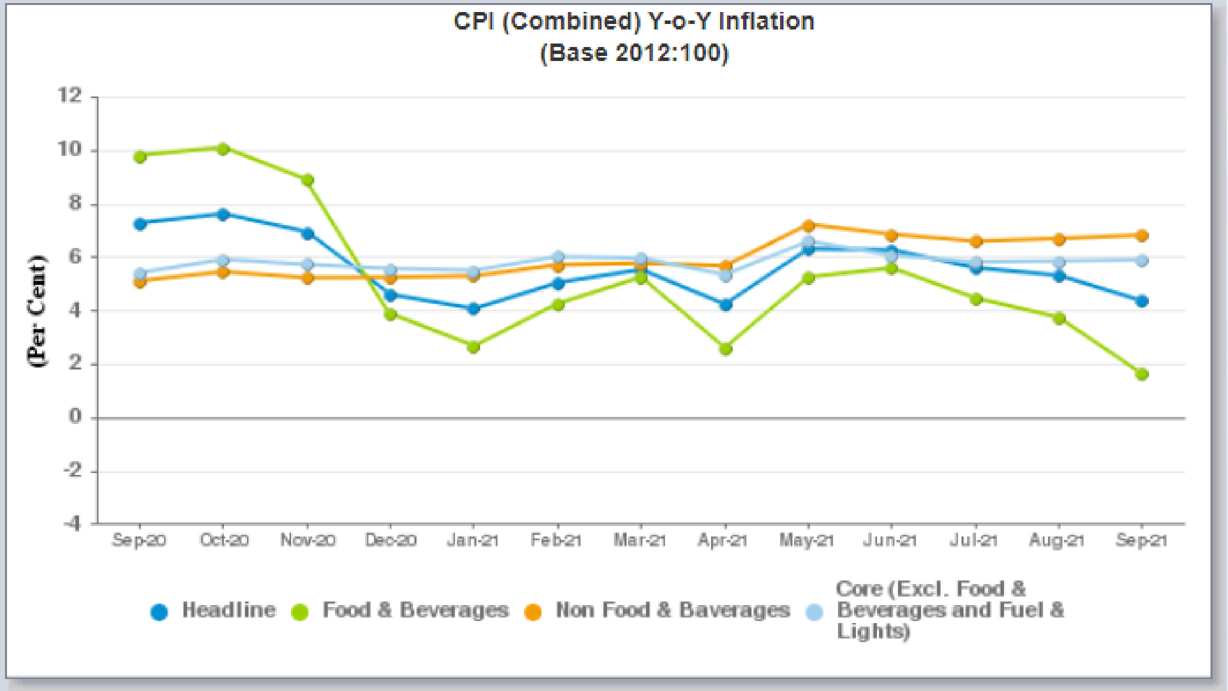


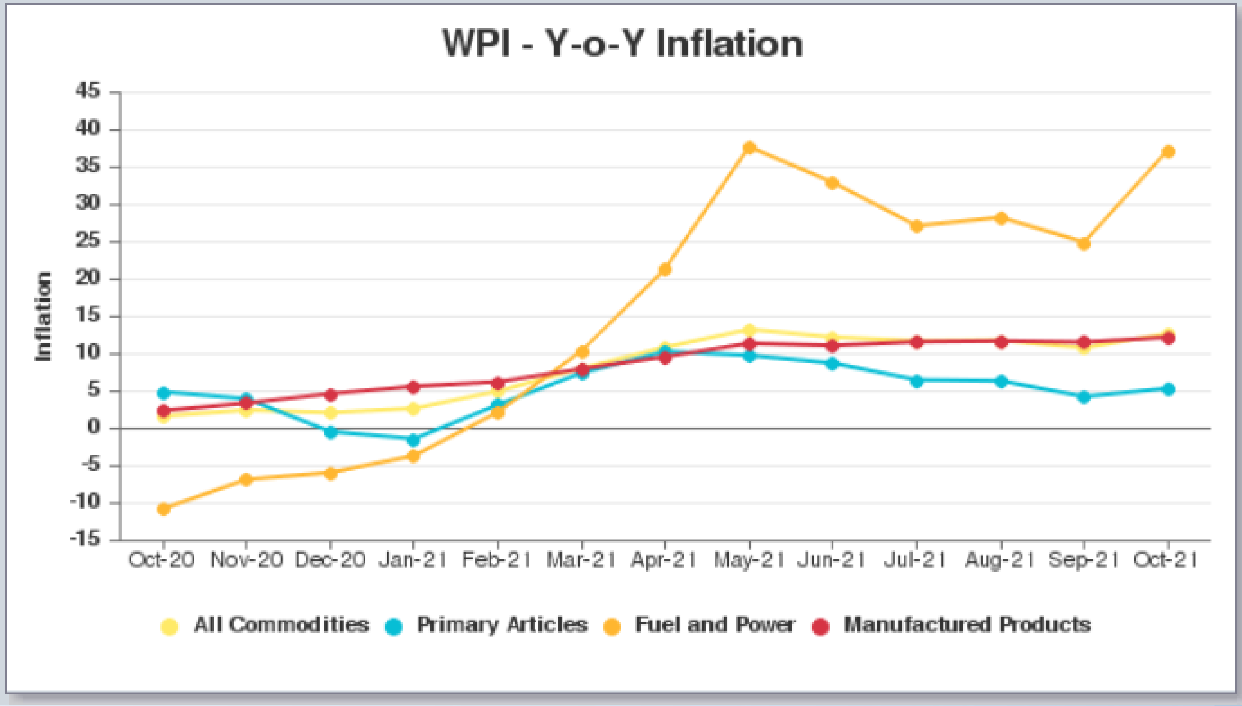




Data Source: RBI

# b. Inflation reports (4)

- CPI & WPI - Inflation % - components - Food & Fuel volatility

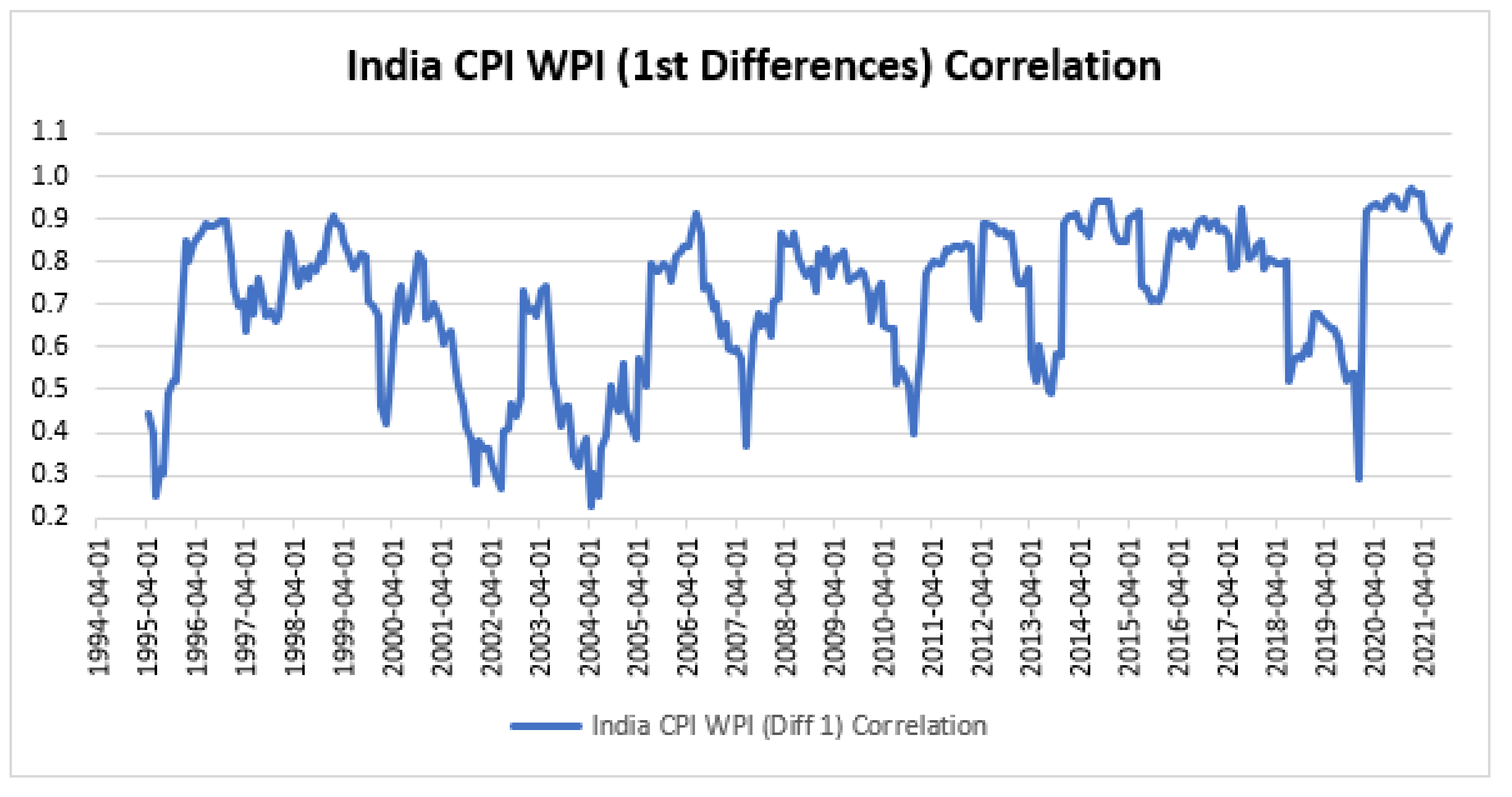



Data Source: RBI

# b. Inflation reports (5)

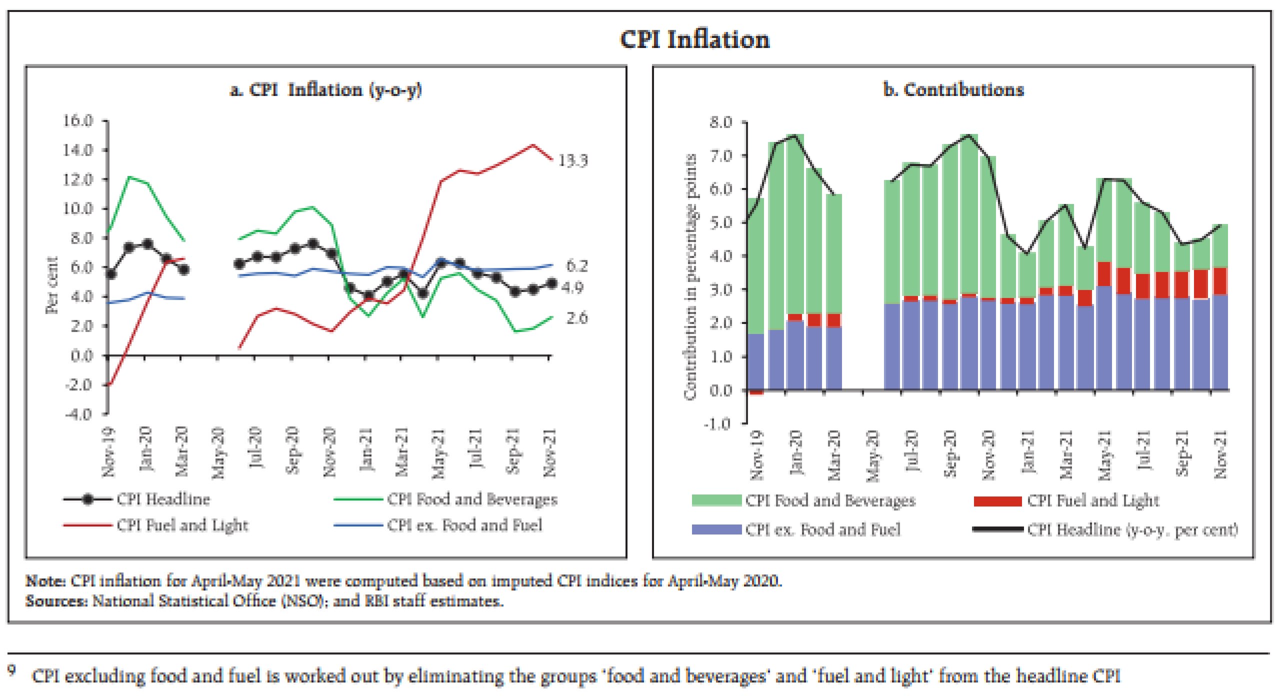
- CPI & WPI - Inflation % - 12 month rolling period correlation of first difference (month on month % changes) of each CPI & WPI time series levels



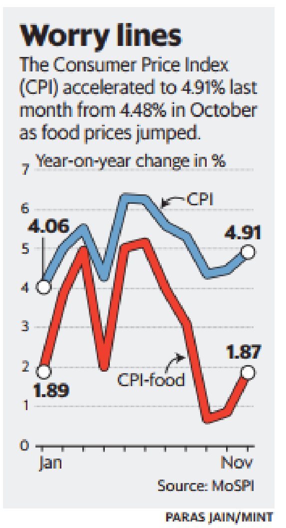

Data Source: RBI

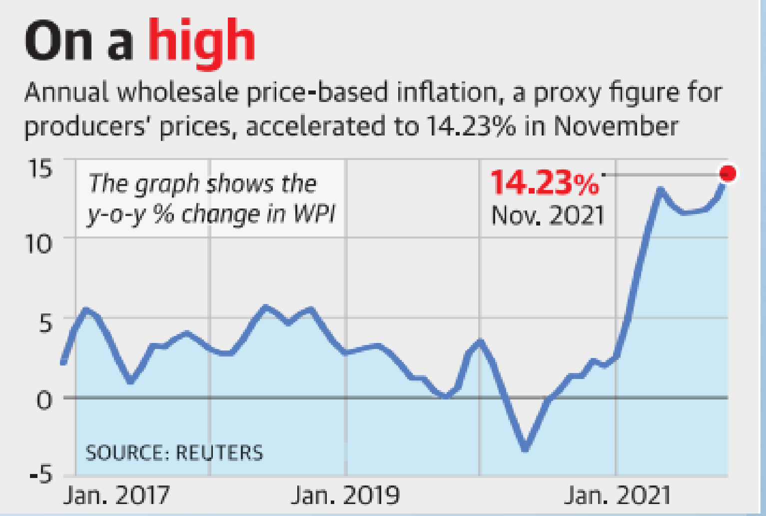
# b. Inflation reports (6)

- CPI: Headline CPI inflation for the month of Nov 2021 was 4.9 %(y-o-y)
- CPI: food & beverages inflation increased to 2.6 %in Nov 2021 (m-o-m)
- CPI: Fuel inflation moderated from the all-time high of 14.3 % to 13.3 % Nov 2021 (m-o-m)
- CPI: Rising per capita income and diversification of Indian diets have raised the demand for high-value food products like milk, eggs, meat, and fish amid supply disruptions.
- WPI inflation increased to 14.23% for Nov 2021 (y-o-y)




Source: RBI






Source: Mint & Business Line

# b. Inflation - Review

- Differences in wholesale and retail price indices, with reference to composition, taxes, distribution, transport. Reporting periodicity different. WPI has a higher weight of fuel and less of food. CPI is undergoing a change in composition due to diversification in food habits

- Core inflation excludes seasonal and volatile components, while headline inflation is the raw inflation number. The latter is more volatile due to fuel and food.

- Indices show a similar trend in levels but the YoY differences between WPI and CPI is large and erratic.

- WPI and CPI inflation % on a MoM basis is more volatile compared to YoY inflation

- Statistical correlation between WPI & CPI - MoM inflation, is positive and high on average for the full time series (0.69), but is highly volatile for 12 month rolling periods (max=0.94, min=0.20, standard deviation=0.18)

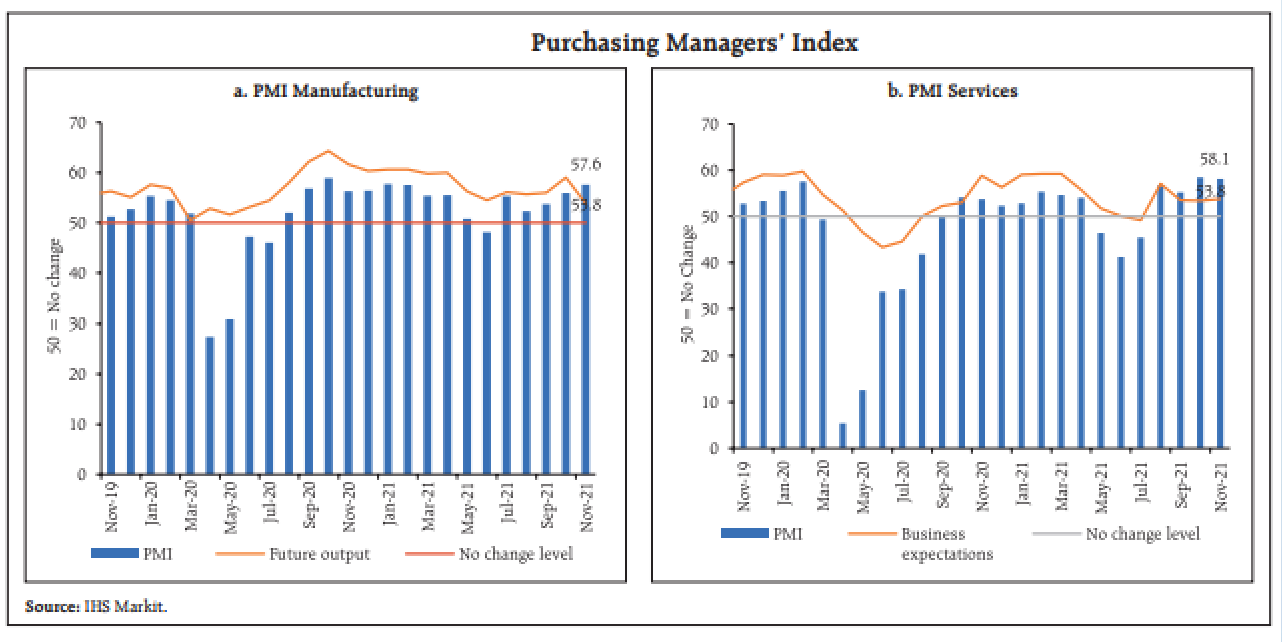
Section

# c. Industrial & Services Indicators

- Leading
- Coincident
- Mixed
- Index of Industrial Production

# c. Indicators - Leading

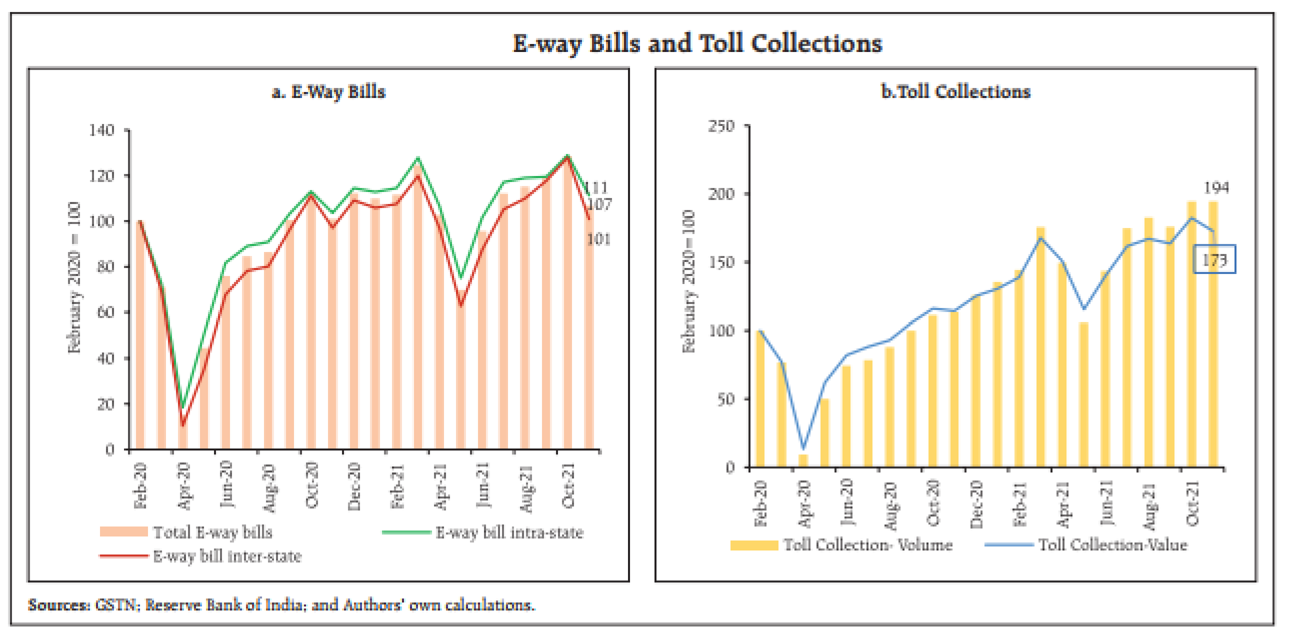
- PMI are leading economic indicators compiled by IHS Markit, A PMI reading over 50 or 50% indicates growth or expansion of the manufacturing or services
- Headline Mfg. PMI improved to 57.6 in November 2021 from 55.9 a month ago
- PMI services remained in expansion at 58.1 due to increase in new orders

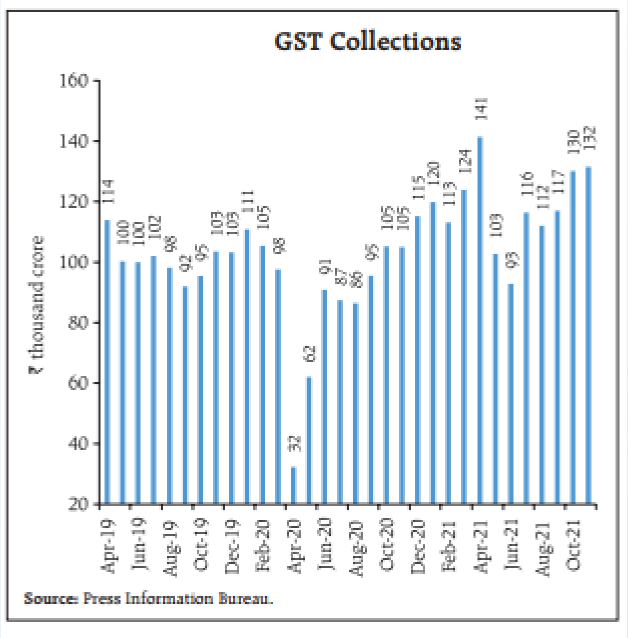



Source: RBI

# c. Indicators - Coincident

- E-Way bills improvement has later declined during festive season
- Toll collections up trend, has shown 71.5% growth YoY in Nov 2021
- GST collection up trend, has shown 25.3% growth YoY in Nov 2021




Source: RBI

# c. Indicators – Mixed (leading & coincident)

- Services sector exhibited strong growth, particularly in trade, hotels, transport communication and GST e-way bills

**High Frequency Indicators- Services**

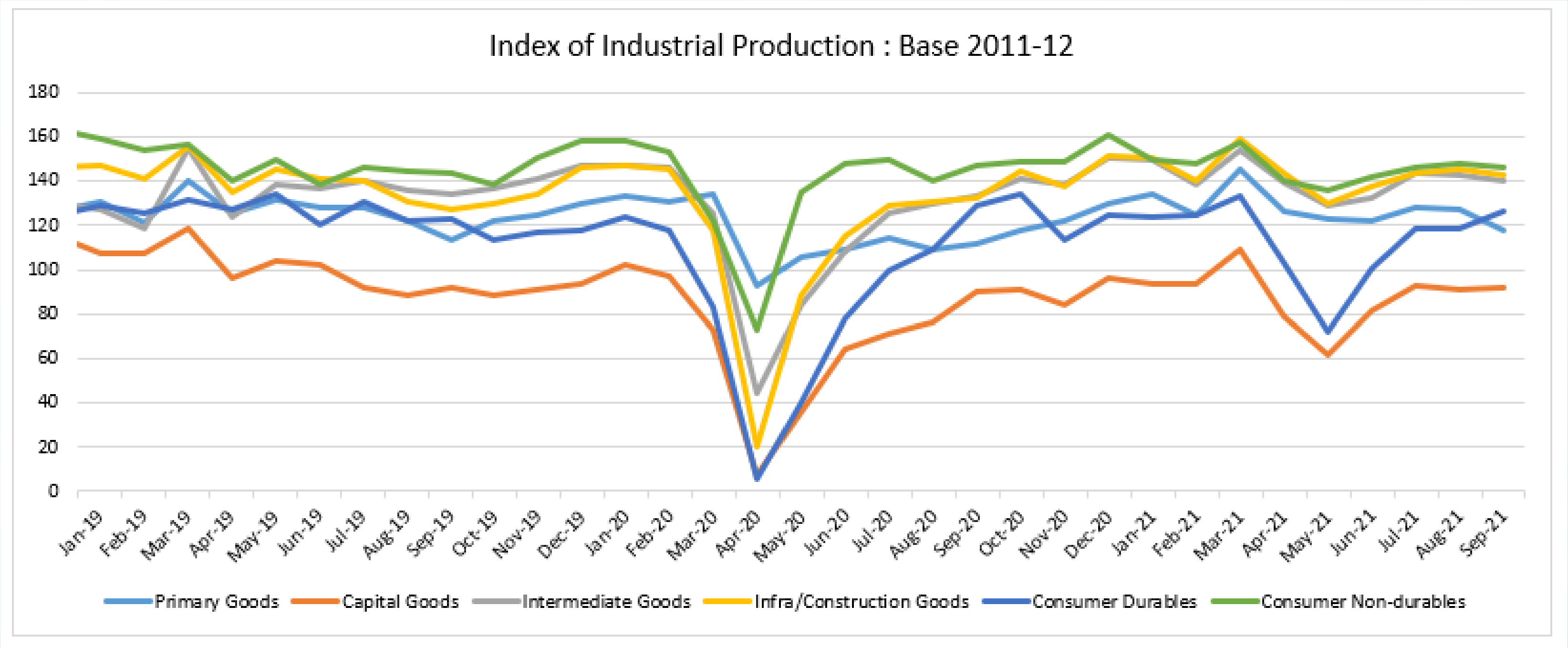
| | High Frequency Indicators- Services Growth (y-o-y, per cent) | | | | | | Growth over 2019 | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| **Sector** | **Indicator** | **Jul-21** | **Aug-21** | **Sep-21** | **Oct-21** | **Nov-21** | **Jul 21/ Jul 19** | **Aug 21/ Aug 19** | **Sep 21/ Sep 19** | **Oct 21/ Oct 20** | **Nov 21/ Nov 19** |
| Urban Demand | Passenger Vehicles Sales | 44.7 | 7.6 | -41.2 | -27.1 | -18.6 | 39.1 | 22.8 | -25.6 | -16.7 | -14.8 |
| Rural Demand | Two Wheelers Sales | -2.1 | -14.6 | -17.4 | -24.9 | -34.4 | -17.1 | -12.1 | -7.7 | -12.3 | -25.5 |
| | Three Wheelers Sales | 40.5 | 59.7 | 53.8 | 19.1 | -6.6 | -67.9 | -60.5 | -56.0 | -52.6 | -59.7 |
| | Tractor Sales | 3.3 | -17.0 | -14.8 | 0.4 | -22.5 | 43.1 | 45.0 | 9.3 | 8.2 | 17.2 |
| Trade, hotels, transport, communication | Commercial Vehicles Sales | | 24.5 | | | | | 0.6 | | | |
| | Railway Freight Traffic | 18.4 | 16.9 | 3.6 | 8.4 | 6.1 | 13.0 | 21.5 | 19.7 | 25.1 | 15.6 |
| | Port Cargo Traffic | 6.7 | 11.5 | 0.5 | 6.3 | -0.2 | -7.2 | -0.1 | -1.4 | 5.3 | 2.7 |
| | International Air Cargo Traffic | 41.3 | 35.7 | 10.1 | 6.7 | | -17.2 | -13.1 | -11.8 | -10.0 | |
| | Domestic Air Passenger Traffic | 31.5 | 25.8 | 18.1 | 23.8 | | -8.0 | -5.5 | 2.0 | 8.4 | |
| | International Air Passenger Traffic | 140.7 | 132.6 | 76.5 | 68.7 | | -58.1 | -43.8 | -38.4 | -27.0 | |
| | GST E-way Bills (Total) | 45.9 | 119.2 | 155.9 | 162.9 | | -86.1 | -77.5 | -68.9 | -61.0 | |
| | GST E-way Bills (Intra State) | 32.7 | 33.3 | 18.3 | 14.5 | 5.9 | 23.0 | 28.6 | 29.6 | 39.0 | 14.5 |
| | GST E-way Bills (Inter State) | 31.6 | 30.8 | 15.6 | 14.1 | 7.3 | 26.5 | 32.7 | 33.0 | 40.7 | 17.6 |
| | Tourist Arrivals | 34.4 | 37.2 | 22.3 | 15.1 | 3.9 | 17.9 | 22.9 | 25.0 | 36.7 | 10.1 |
| Construction | Steel Consumption | 4.2 | -2.2 | -3.2 | -6.8 | -8.0 | -6.6 | -13.3 | -3.1 | -0.9 | 9.0 |
| | Cement Production | 21.7 | 36.4 | 11.3 | 14.6 | | 5.3 | 16.6 | 7.5 | 18.3 | |
| PMI Index | Manufacturing | 55.3 | 52.3 | 53.7 | 55.9 | 57.6 | | | | | |
| | Services | 45.4 | 56.7 | 55.2 | 58.4 | 58.1 | | | | | |

**Sources:** CMIE; CEIC data; IHS Markit; SIAM; Airports Authority of India and Joint Plant Committee.

Source: RBI

# c. Indicators – Index of Industrial Production

- Index of Industrial Production levels appear to have recovered but are flat post recovery




Data Source: RBI

# c. Indicators – Review

- PMI, a leading indicator has been reading an expansion in manufacturing & services
- Coincident indicators, Toll & GST collections indicate a strong positive trend. E-way bill levels have been less robust
- Trade, hotels and transport indicate a positive growth for several months. Domestic airline travel volumes below pre-covid volumes
- Rural sales weak for many consumer durables and non-durables
- Index of Industrial Production, an aggregate measure has recovered but has barely reached pre covid levels. *This data matches with GDP and supply level data*

Section

# d. Credit Markets & Rates

- Monetary Policy
- Policy & Rates
- Liquidity
- Term rates
- Bank lending
- Review

# d. Credit Markets & Rates – Monetary Policy

- Monetary policy refers to the use of instruments such as money supply and interest rate to control the output gap.

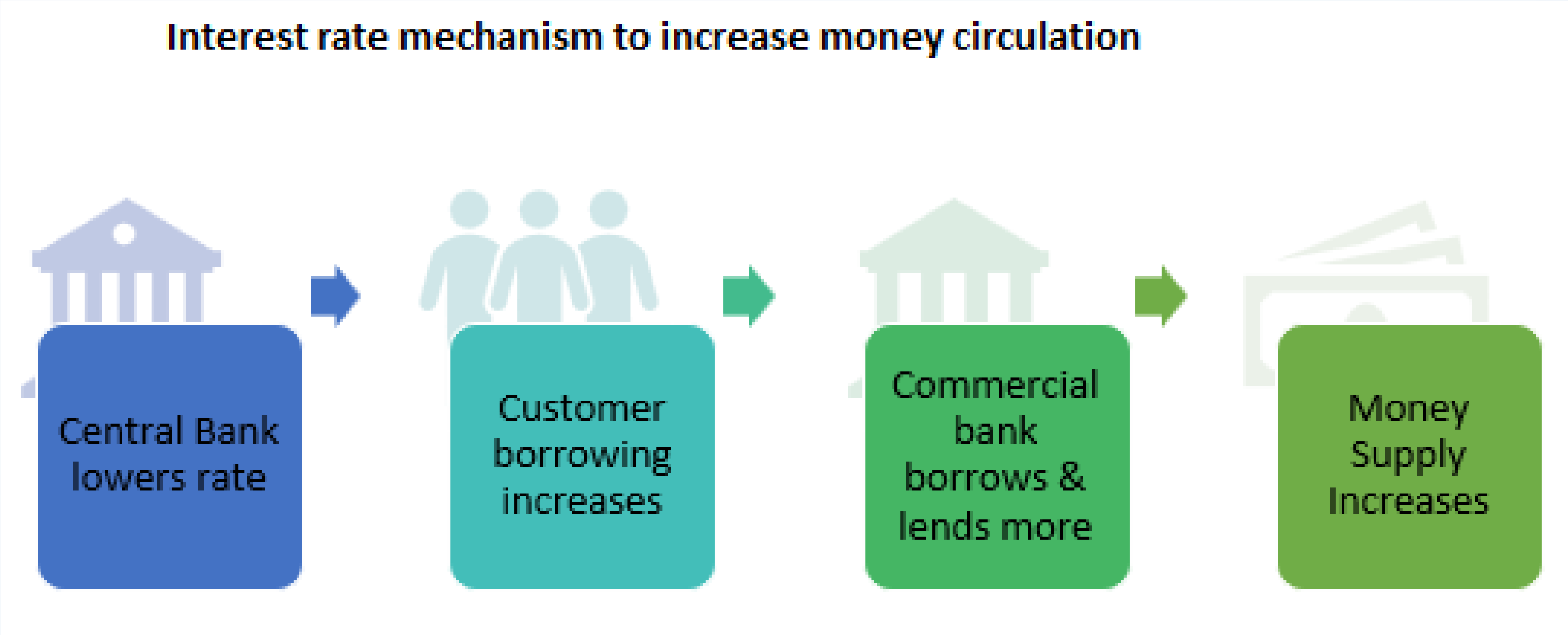
- RBI influences changes in money supply by changing the rate at which it gives loans or borrows money from commercial banks. It uses the LAF (Liquidity Adjustment Facility) as a mechanism for the injection and absorption of liquidity available to banks and to overcome mismatches in supply and demand from time to time. Through LAF, commercial banks can obtain liquidity in a crunch and park excess funds with the central bank in case of excess liquidity. LAF is operated through collateralised lending and borrowing instruments called Repos and Reverse Repos.

- Open market operations (OMO) refers to a central bank buying or selling short-term Treasuries and other securities in the open market in order to influence the money supply.

- Indian quantitative easing (QE) featured the use of long term repo operations (LTRO) along with OMO operations and government securities acquisition program (GSAP). Using these instruments RBI lowered rates and provided liquidity into the system.

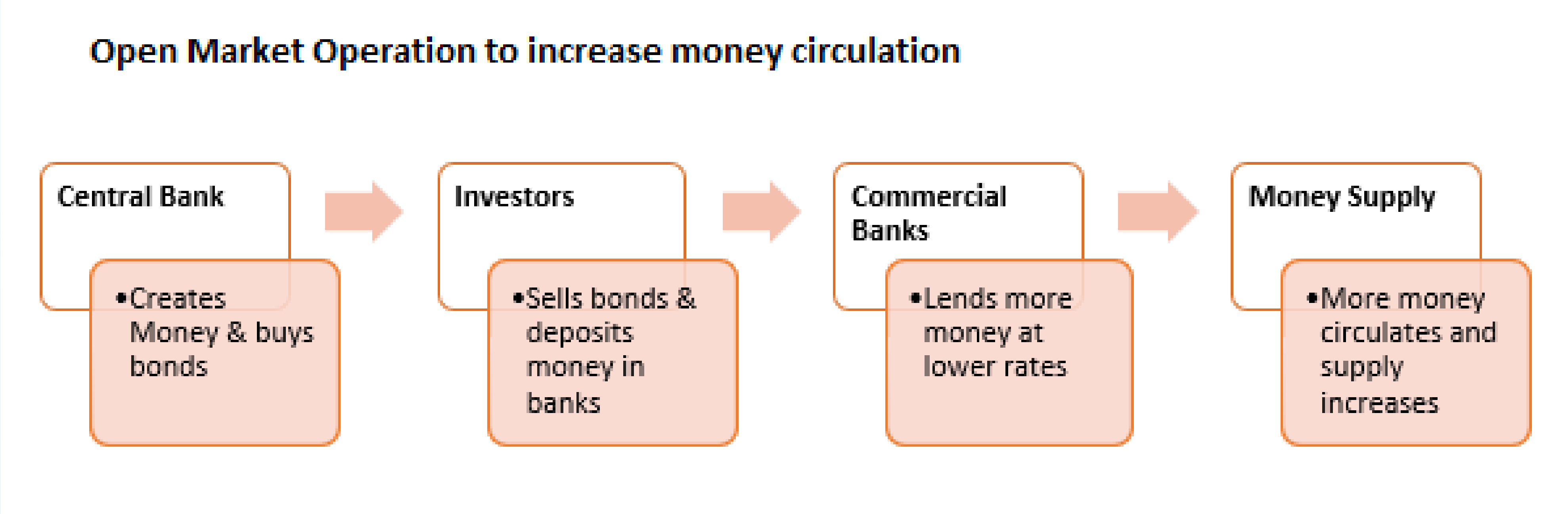
# d. Credit Markets & Rates – Monetary Policy (2)

- Instruments and mechanisms – Key policy interest rates



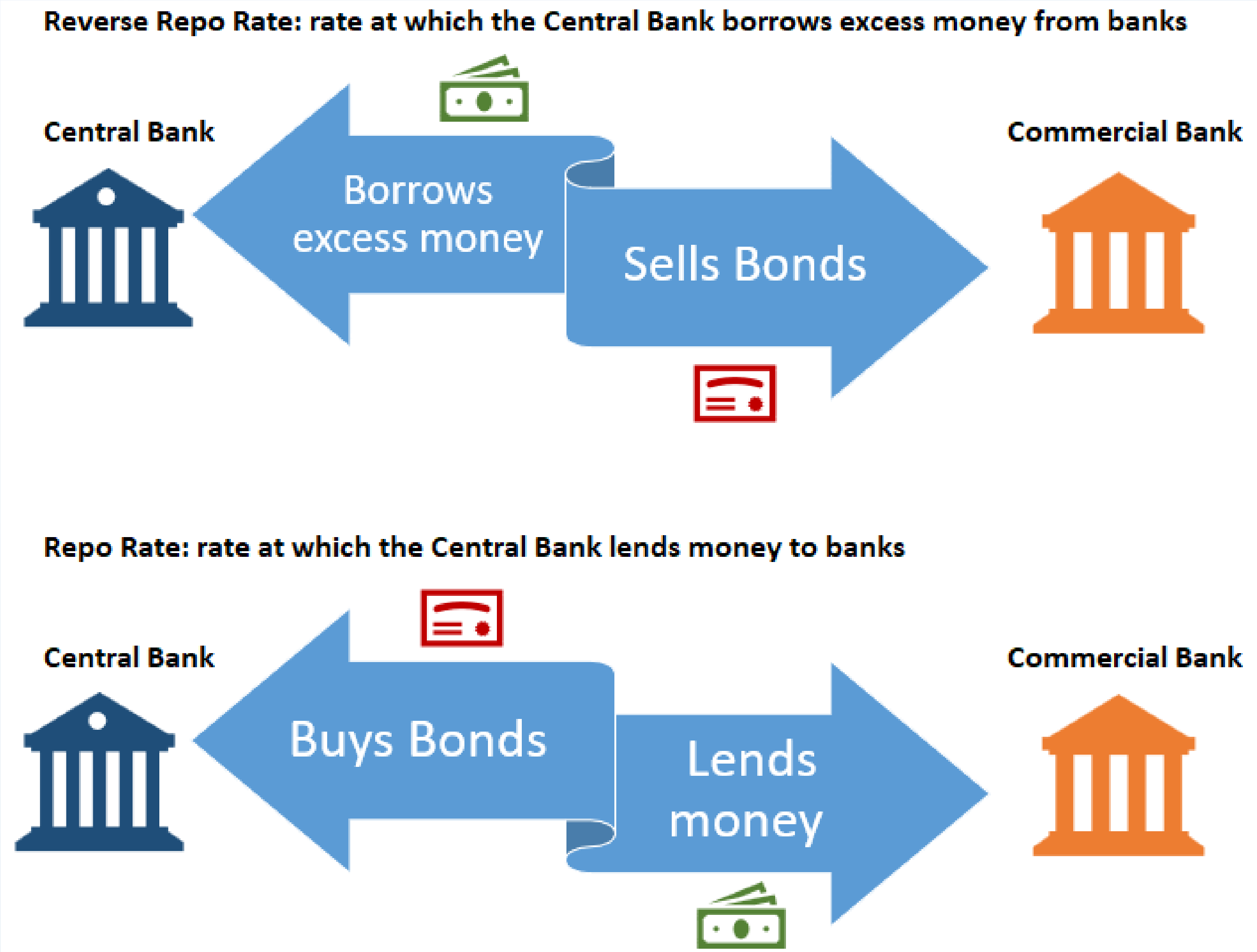
# d. Credit Markets & Rates – Monetary Policy (3)

- Instruments and mechanisms – Open Market Operations (OMO)
- Example is of increasing money supply. It can be used to decrease money supply by the opposite action of selling bonds. These are outright sale & purchase of securities



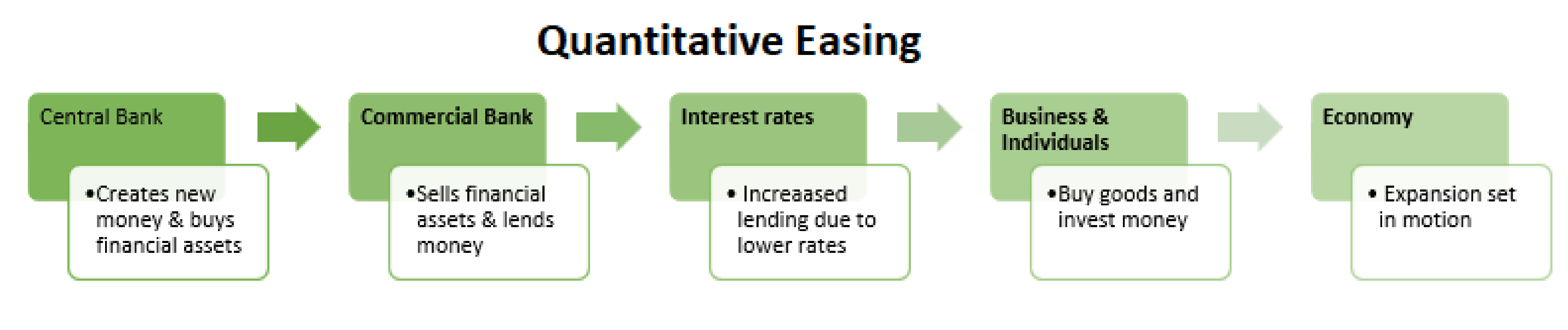
# d. Credit Markets & Rates – Monetary Policy (4)

- Instruments and mechanisms – Reverse & Repo Rates : Collaterised borrowing & lending



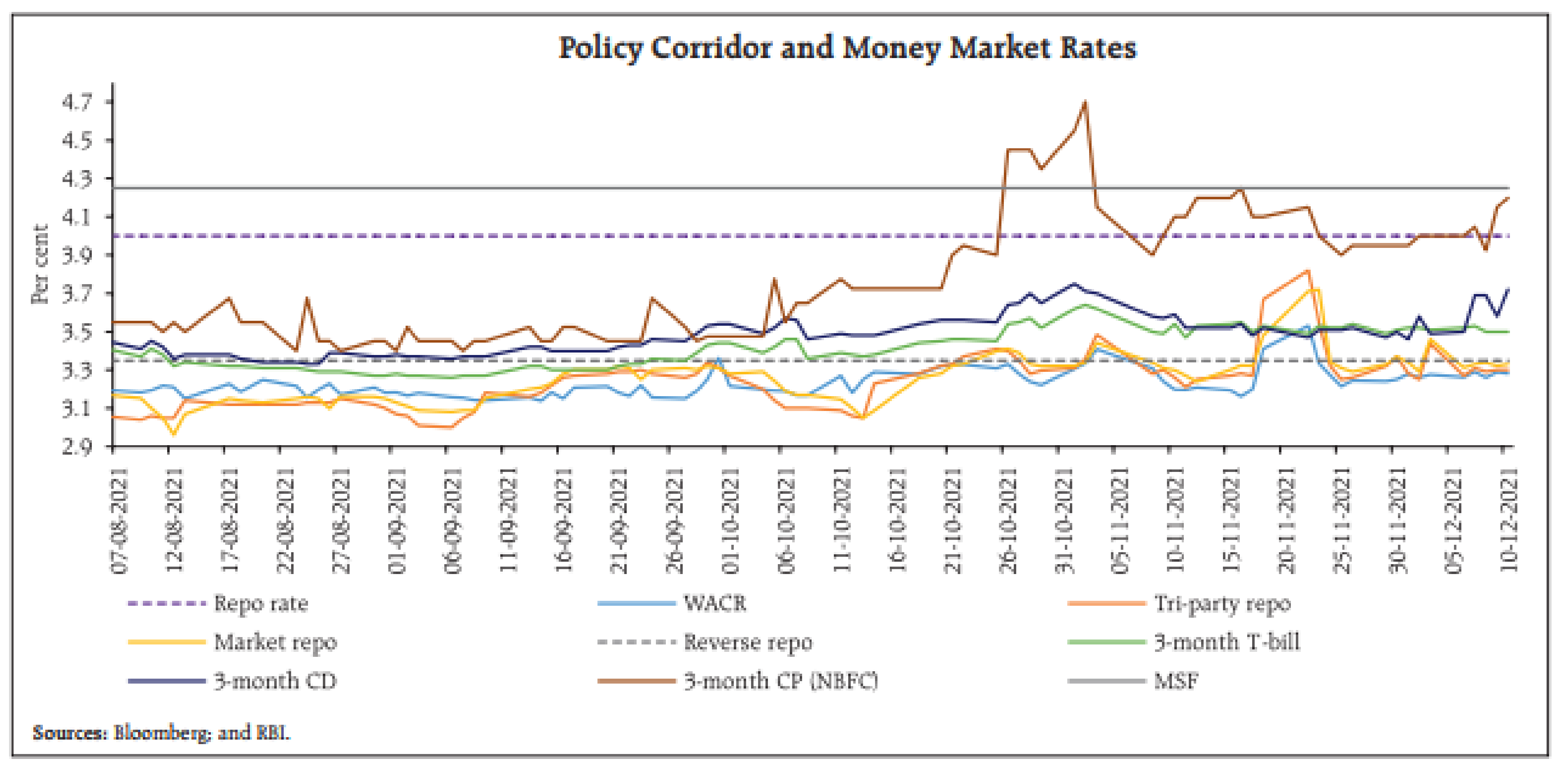
# d. Credit Markets & Rates – Monetary Policy (5)

- Instruments and mechanisms – Quantitative Easing (QE) is the expansion of central bank liability to buy financial assets. Its opposite is the 'Taper'



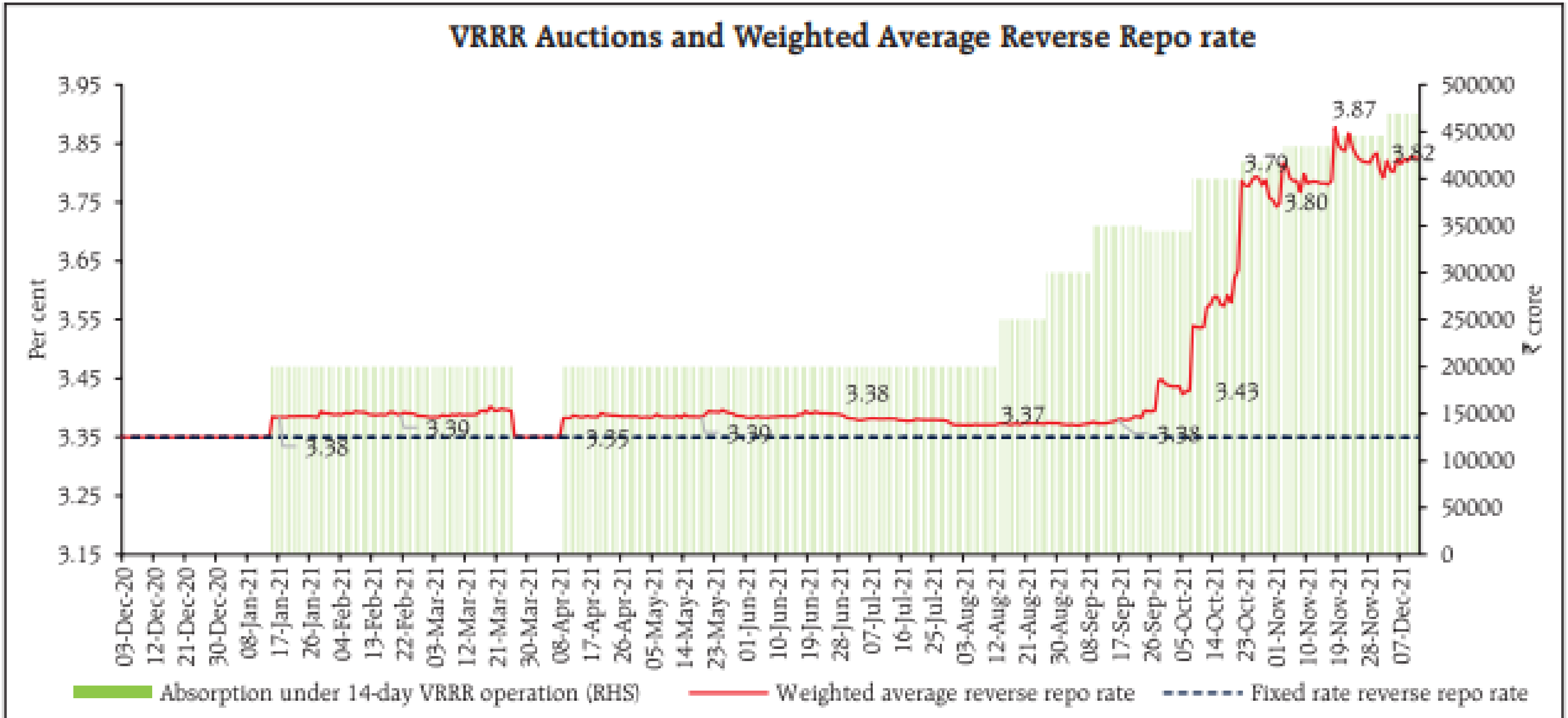
# d. Credit Markets & Rates – Policy & rates

- Policy corridor rates (borrowing & lending rates) & Money Market Rates



# d. Credit Markets & Rates – Liquidity

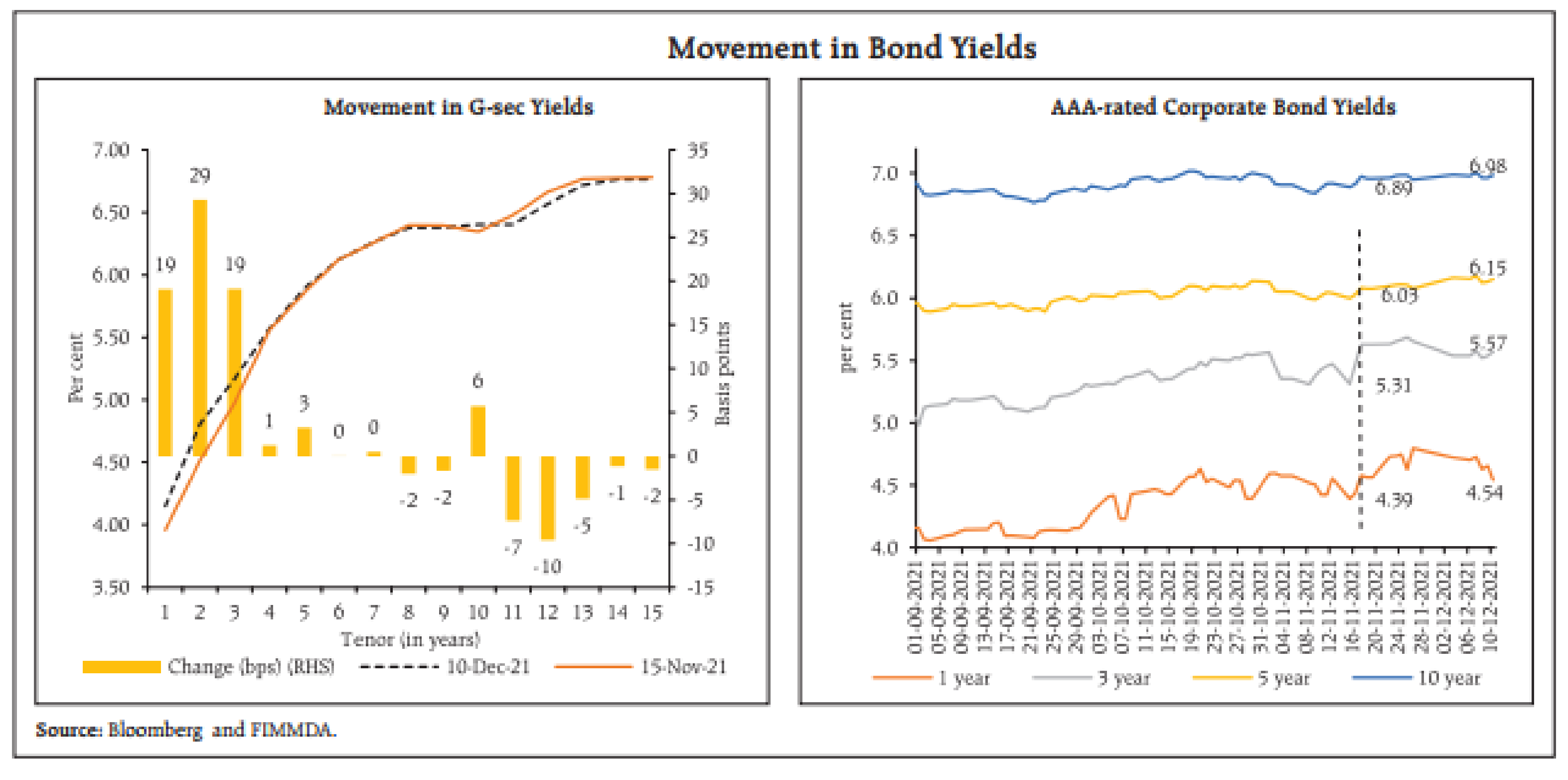
- Surplus liquidity




Source: RBI and staff calculations.

# d. Credit Markets & Rates – Term rates

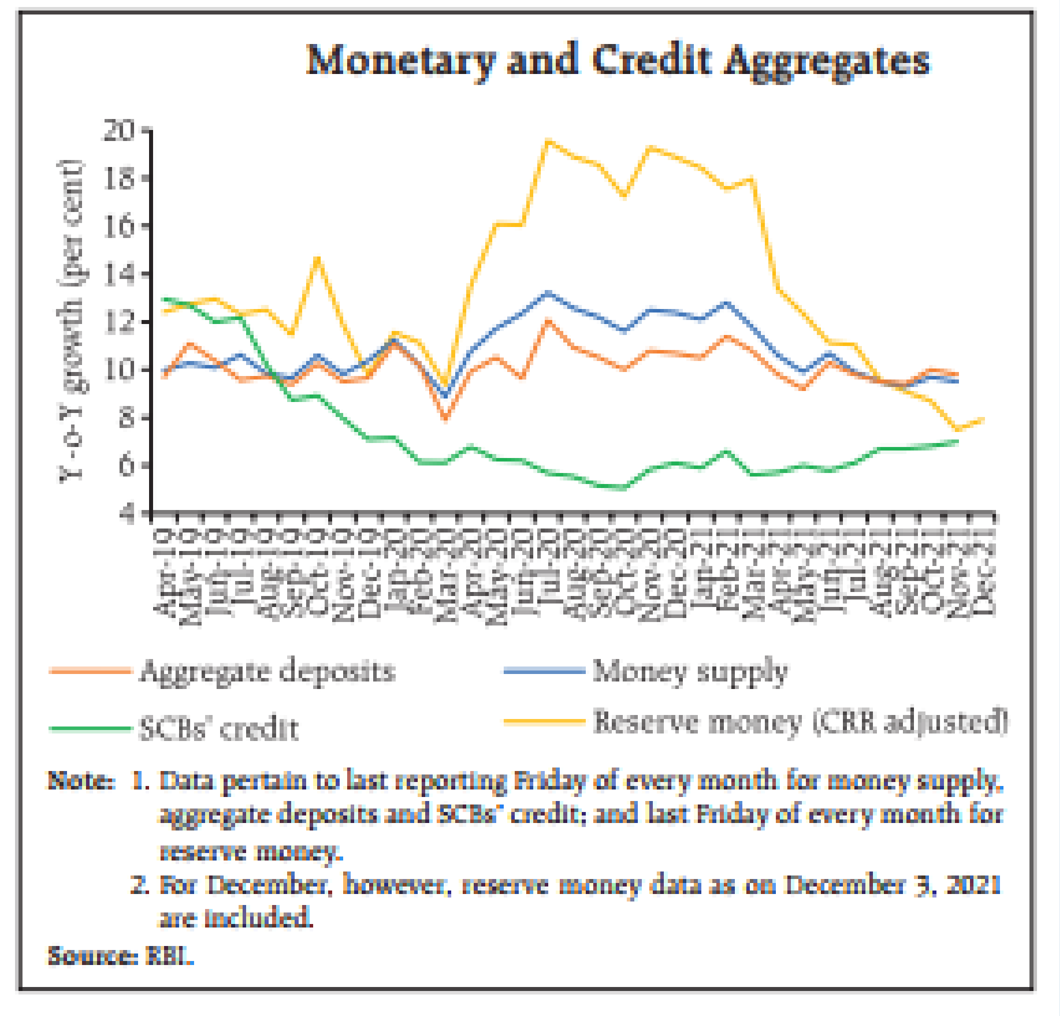
- High liquidity & Increasing term rates – delinking of volume and rates in markets

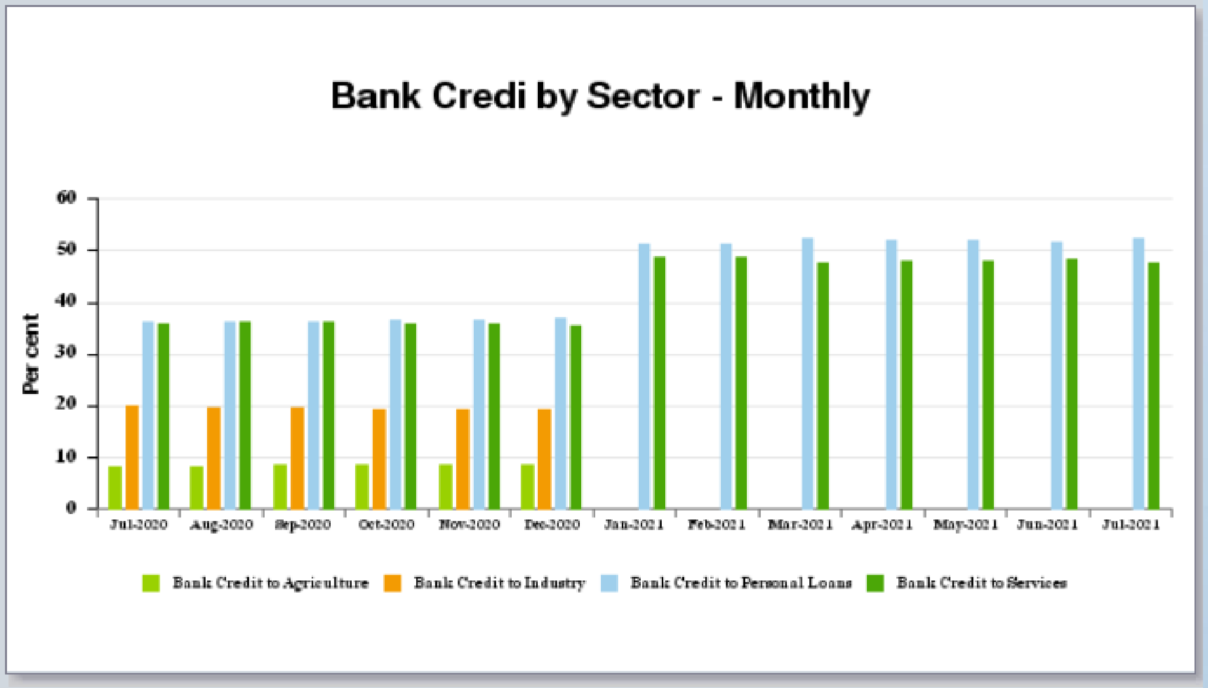



Source: RBI

# d. Credit Markets & Rates – Bank lending

- Bank credit growth and composition




Source: RBI

# d. Credit Markets & Rates – Review

- Liquidity provided starting before Covid-9, by Repo and Open Market Operations, continued and supplemented by government securities acquisition program
- Currently around INR 6-9 trillion of surplus liquidity exist in the reverse repo window.
- Deployment avenues for funds is currently limited. Poor demand in industry, low private investments, recycling of funds by MSME (to repay existing loans), review of bank's customer's debtors profile are some of the factors. Funds have moved substantially to equities and other assets.
- RBI's policy has not succeeded in reducing longer term interest rates
- RBI's exit from surplus liquidity poses a challenge. Liquidity can be reversed and interest rate links restored by :
  - Bank credit growth
  - Investment cycle improving
  - Increased government borrowings
  - RBI undertaking OMOs to reverse liquidity

Section

# e. Foreign Exchange

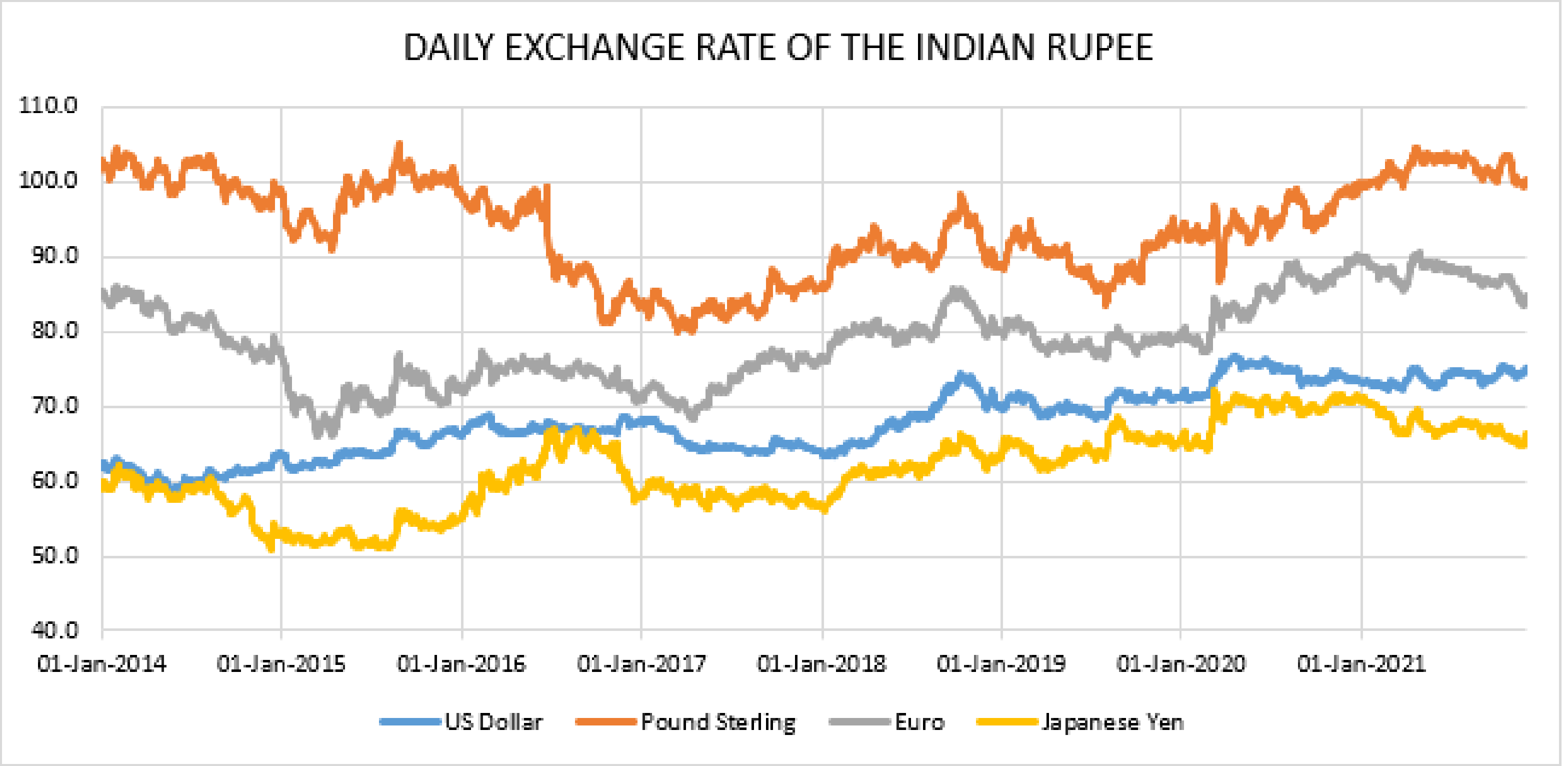
- Levels
- Volatility
- Real Exchange Rates

# e. Foreign Exchange Rates - Levels

- Foreign currency daily exchange rates & annual compounded growth rates

INR exchange rate changes (per annum compounded)

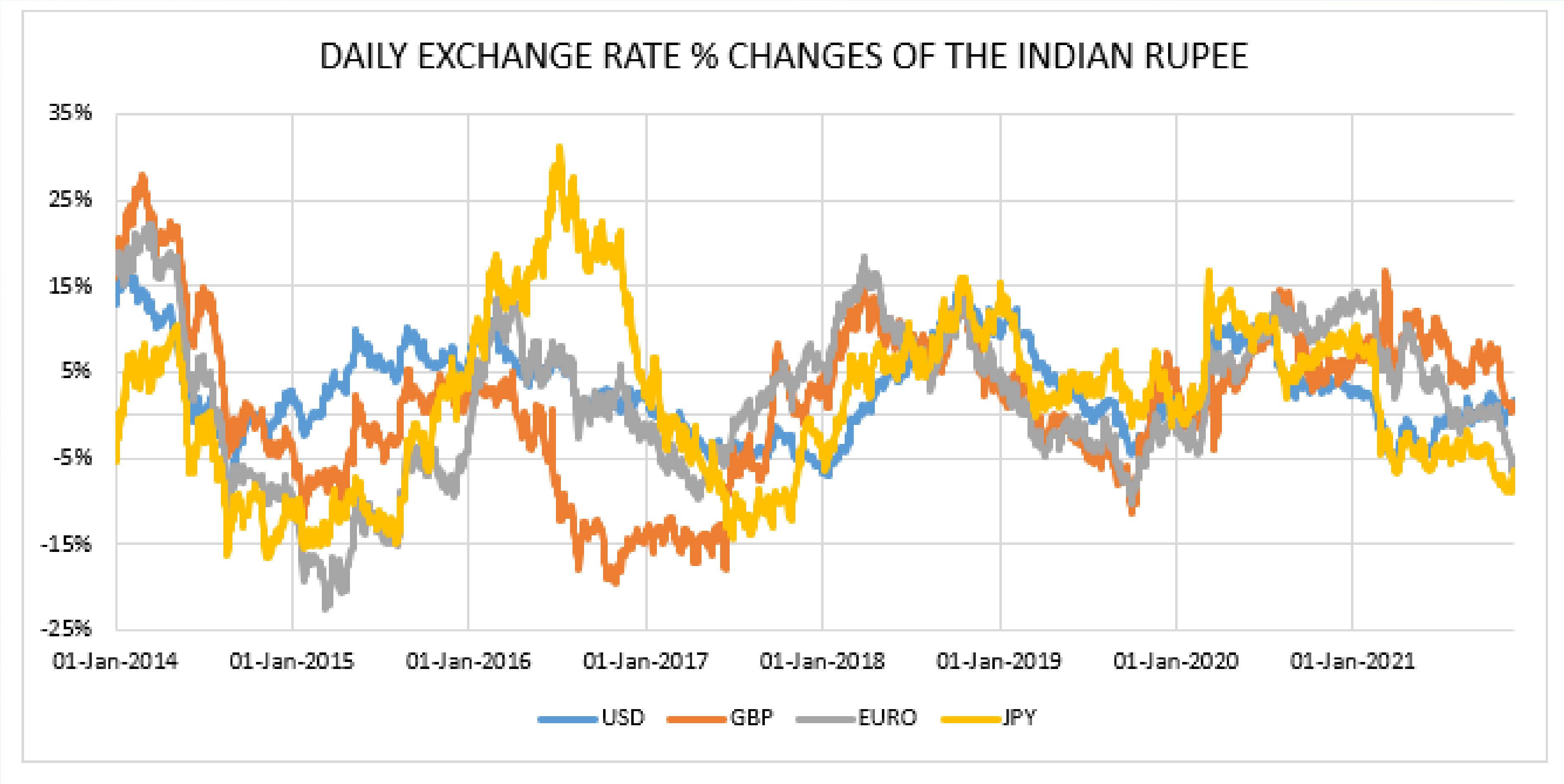
| | USD | GBP | EURO | JPY |
|---|---|---|---|---|
| 1999 - 2021 | 2.5% | 1.5% | 2.3% | 2.5% |




Source: Data from RBI

# e. Foreign Exchange Rates – Volatility

- Decreasing volatility in general since last Taper (overseas rate hike and reversal of easy money era, circa 2013)




Source: Data from RBI

# e. Foreign Exchange Rates – Real Exchange Rates

- Is a currency correctly valued ?

- Most people are familiar with the nominal exchange rate, the price of one currency in terms of another. It's usually expressed as the domestic price of the foreign currency. So if it costs a US dollar holder $1.18 to buy one euro, from a euro holder's perspective the nominal rate is €0.85 per dollar (that is, 1/1.18). But the nominal exchange rate isn't the whole story. The person or firm buying another currency is interested in what can be bought with it. Are they better off with dollars or euros? That's where the RER comes in. It seeks to measure the value of a country's goods against those of another country, a group of countries, or the rest of the world at the prevailing nominal exchange rate.

- The real exchange rate (RER) between two currencies is the product of the nominal exchange rate (the dollar cost of a euro, for example) and the ratio of prices between the two countries. The core equation is $RER = eP^*/P$, where, in our example, e is the nominal dollar/euro exchange rate, $P^*$ is the average price of a good in the euro area, and P is the average price of the good in the United States.

- In the Big Mac example, e = 1.36. If the German price is 2.5 euros and the U.S. price is $3.40, then (1.36) X (2.5) ÷ 3.40 yields an RER of 1. But if the German price were 3 euros and the U.S. price $3.40, the RER would be 1.36 X 3 ÷ 3.40, for an RER of 1.2.

Source: IMF

# e. Foreign Exchange Rates – Real Exchange Rates (2)

- Overvalued real rates

**Indices of Nominal Effective Exchange Rate (NEER) and Real Effective Exchange Rate (REER) of the Indian Rupee**

| Item | 2019-20 | 2020-21 | 2020 | 2021 | |
|---|---|---|---|---|---|
| | | | October | September | October |
| | 1 | 2 | 3 | 4 | 5 |
| **40-Currency Basket (Base: 2015-16=100)** | | | | | |
| 1 Trade-weighted | | | | | |
| 1.1 NEER | 98.00 | 93.92 | 94.69 | 94.50 | 93.60 |
| 1.2 REER | 103.20 | 103.46 | 106.40 | 105.56 | 105.45 |
| 2 Export-weighted | | | | | |
| 2.1 NEER | 97.38 | 93.59 | 94.52 | 94.07 | 93.15 |
| 2.2 REER | 102.88 | 102.96 | 106.07 | 104.79 | 104.61 |
| **6-Currency Basket (Trade-weighted)** | | | | | |
| 1 Base: 2015-16 = 100 | | | | | |
| 1.1 NEER | 94.92 | 88.47 | 88.97 | 87.83 | 86.59 |
| 1.2 REER | 103.62 | 101.88 | 104.54 | 103.75 | 103.49 |
| 2 Base: 2018-19 = 100 | | | | | |
| 2.1 NEER | 100.78 | 93.93 | 94.46 | 93.25 | 91.93 |
| 2.2 REER | 103.32 | 101.59 | 104.24 | 103.45 | 103.19 |

Source: RBI

# e. Foreign Exchange Rates – Review

- Foreign exchange reserves at $630 Billion
- Increasing rate of foreign investments. $ 82 Billion in FY 20-21
- RBI sterilisation of inflows by buying dollars and selling rupees. Reflected in prices not being in market equilibrium ? Could outflows trigger a fall in rupee ?
- Overvalued REER, not reflecting relative inflation rates of home and foreign currency
- Potential impact of rate increases in major markets will have first order impact on portfolio investment and carry trades. Relative pressures on rates overseas (upwards, due to consistent high inflation) and at home (unchanged due to comfort on inflation range and growth objective). Second order effects will be pressure on import prices in dollar denominated commodities (oil & gas) & capital goods and higher foreign currency borrowing costs.

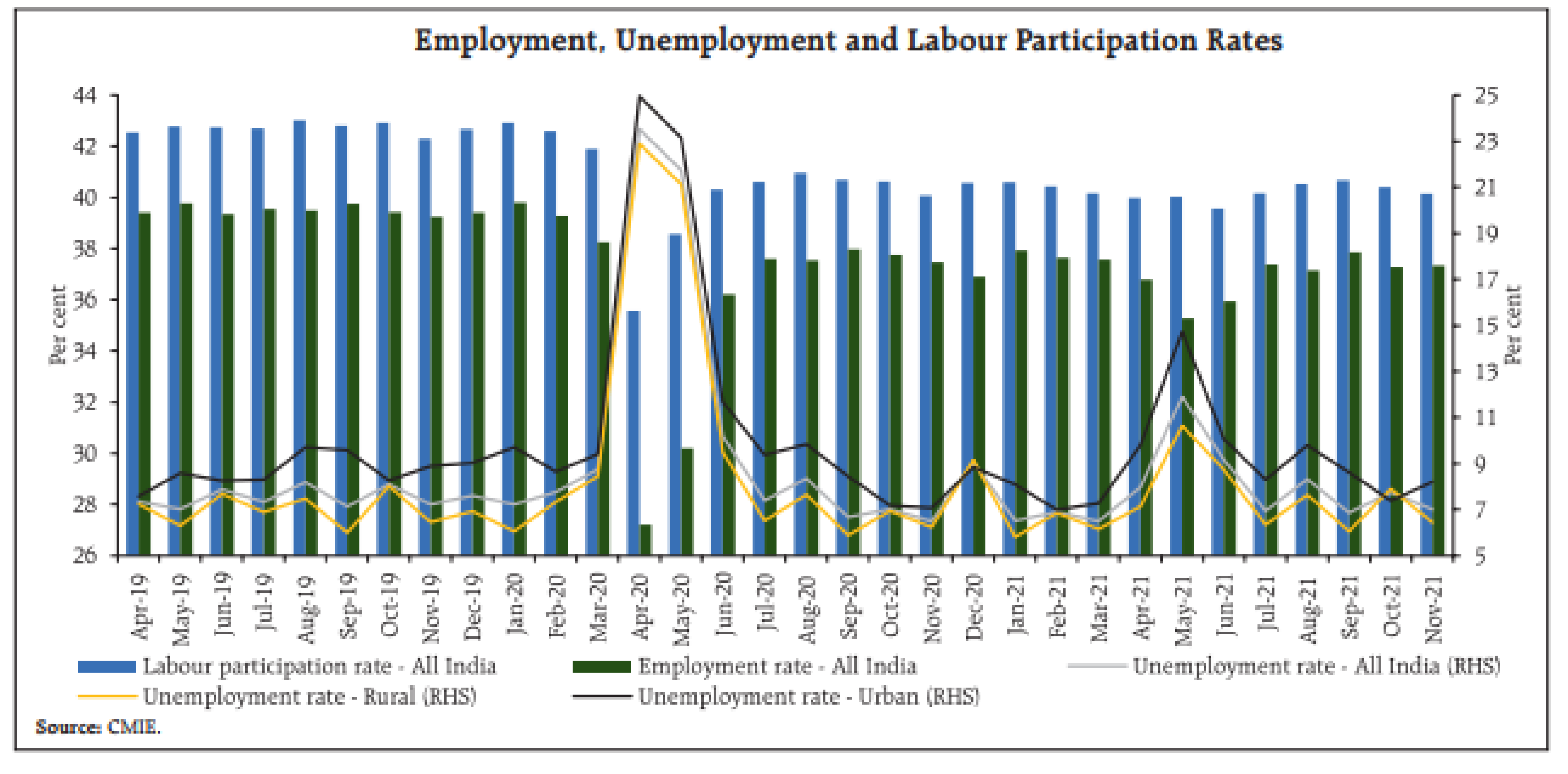
Section

# f. Labor

- Participation
- Employment
- Unemployment
- Women
- Impact of pandemic

# f. Labor – Participation

- As per the household survey of the Centre for Monitoring Indian Economy (CMIE), the labour participation rate fell marginally from 40.4 in October 2021 to 40.2 in November 2021



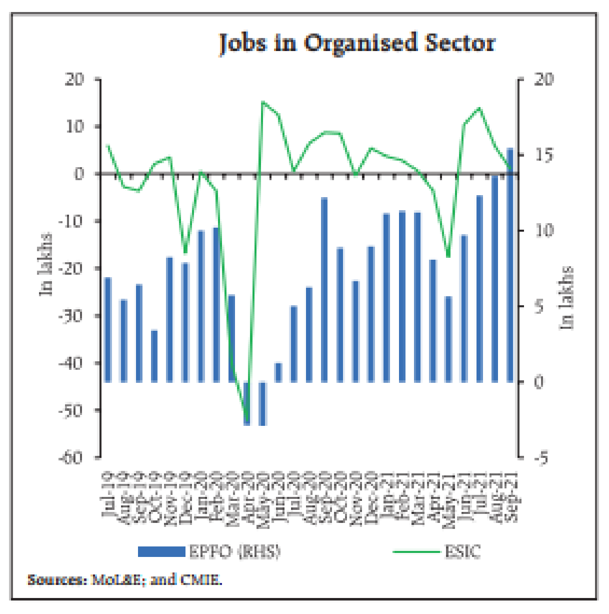

Source: RBI

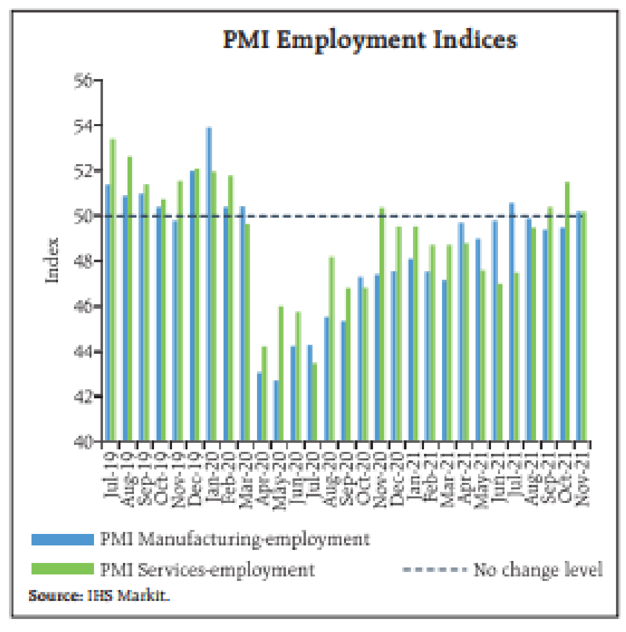
# f. Labor – Employment

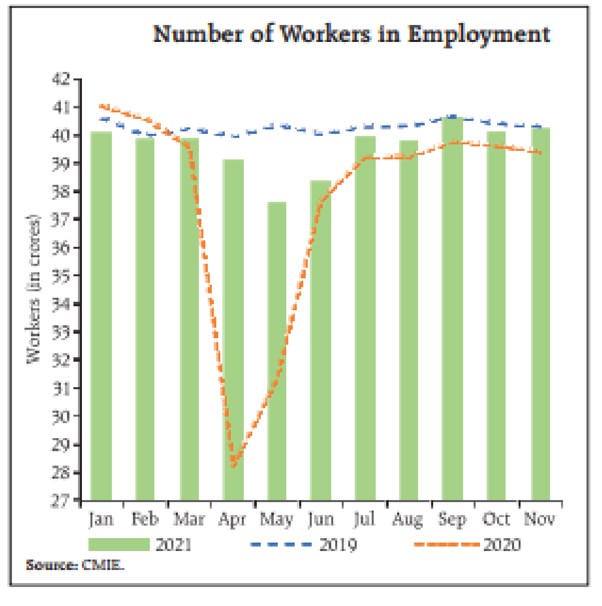
- Organised sector labour market data, as captured by the Employees' Provident Fund Organisation (EPFO) and the Employees' State Insurance Corporation (ESIC), present a mixed picture with net ESIC subscriber additions moderating against a continued increase in net subscribers under the EPFO.

- CMIE's employment statistics show the labour market moved closer to the pre-pandemic level, with the number of workers employed in October - November approaching the levels seen in 2019

- Employment segment of the PMI suggests both manufacturing and services sector jobs expanded marginally in November 2021



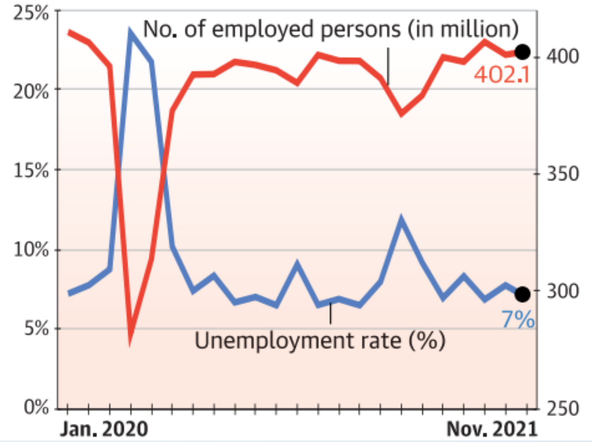

Source: RBI

# f. Labor – Unemployment

- Unemployment rate declined
- Labour force participation rate decreased. Overall rate low
- Labour unemployment increased in urban areas and decreased in rural areas
- Loss of quality jobs, salaried (-6.8 mill.) entrepreneurs (-3.5m). Salaried jobs lower than Nov 2019 levels

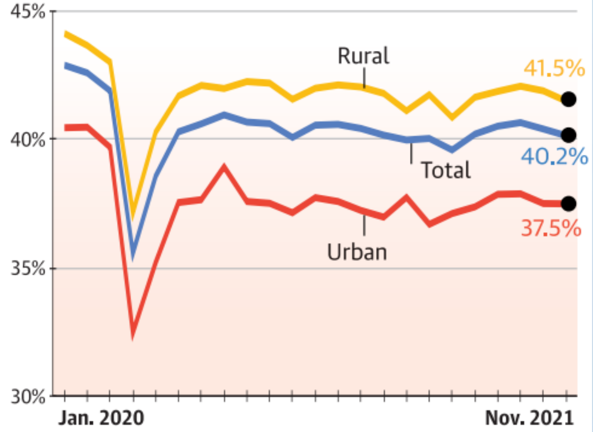
**Unemployment rate**

The unemployment rate declined to 7% in November from 7.8% in October. The total number of employed persons increased by 1.3 million (from 400.8 million in October to 402.1 million in November 2021)



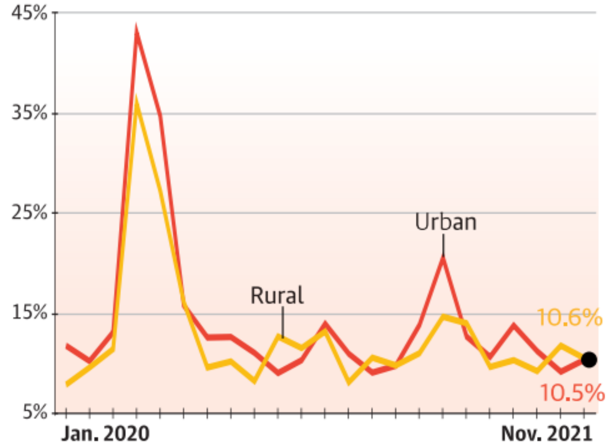

**Labour force participation**

The labour force participation rate also decreased. It fell to 40.2% in November from 40.4% in October. This is the second consecutive month of a fall in the LFPR after a consistent rise was recorded since July 2021. The LFPR in both rural and urban areas declined in November



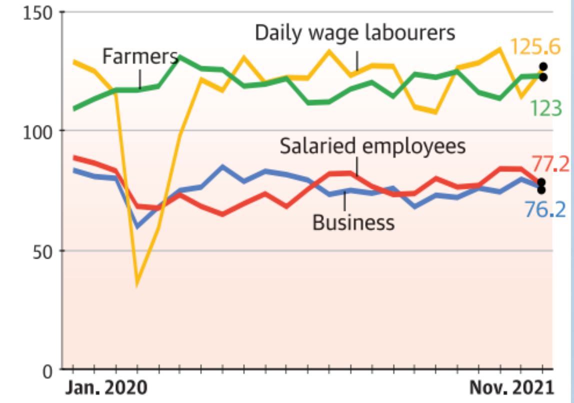

**Urban and rural**

While the overall unemployment rate decreased marginally, it increased in urban areas to 10.5% in November from 9.3% in October. In rural areas, it fell to 10.6% from 11.9%




**Type of jobs**

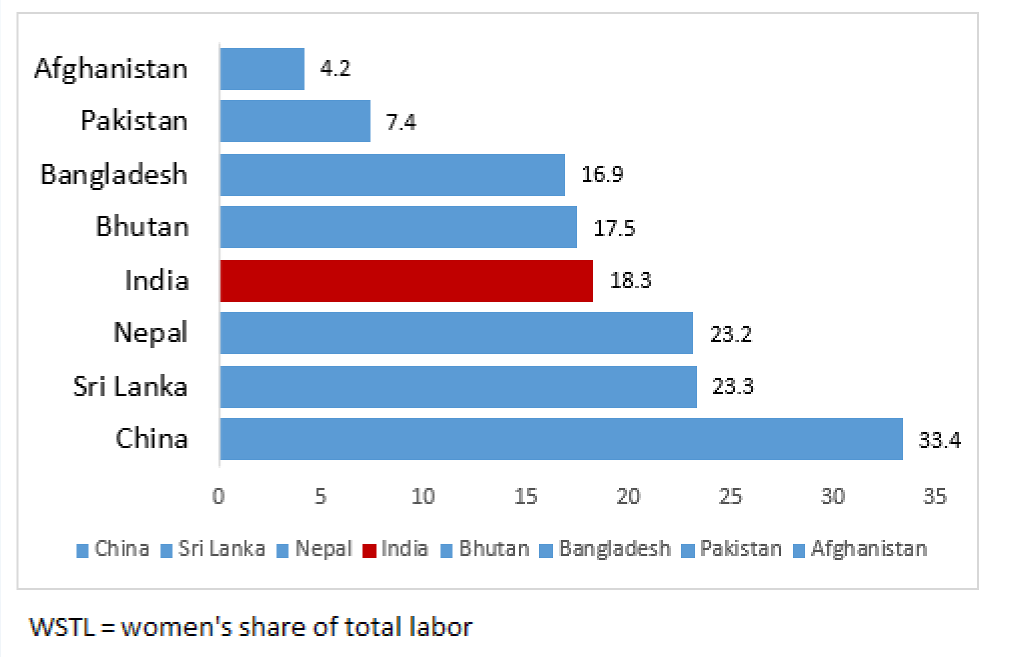
In November, salaried jobs fell by 6.8 million and the number of entrepreneurs declined by 3.5 million. However, there was an increase of 11.2 million in jobs among daily wage labourers and small traders. Salaried jobs, at 77.2 million, were 9.7% lower in November 2021 than they were in November 2019




Source: The Hindu

# f. Labor – Women

- Women's share of labour income in India compared to neighbours




Source: The Hindu

# f. Labor – Impact of Pandemic

- At the anvil of the pandemic, Indian economy was already in the most prolonged slowdown in recent decades
  - Legacy problems included slow rate of job creation
  - Low access to a large section of the workforce, to employment security or social protection
- Pandemic has further increased informality and led to a severe decline in earnings for the majority of workers resulting in a sudden increase in poverty.
- Women and younger workers have been disproportionately affected.
- Households have coped by reducing food intake, borrowing, and selling assets.
- Government relief has helped avoid the most severe forms of distress, but the reach of support measures is incomplete, leaving out some of the most vulnerable workers and households.

(State of Working India 2021, Aziz Premji University)

# f. Labor – Review

- Labour participation levels not yet reached pre-covid levels
- Labour participation rates among the lowest in the world, helped largely by poor women participation rates (declining) even by regional standards
- Unemployment levels have fallen to pre-pandemic levels
- Churn in jobs composition. Lower salaried jobs, higher daily wage & small trader openings.
- Pandemic may have further increased informality, severely dented incomes & increased poverty. Women and younger workers more effected. Impact on household's food intake and deterioration of financial conditions

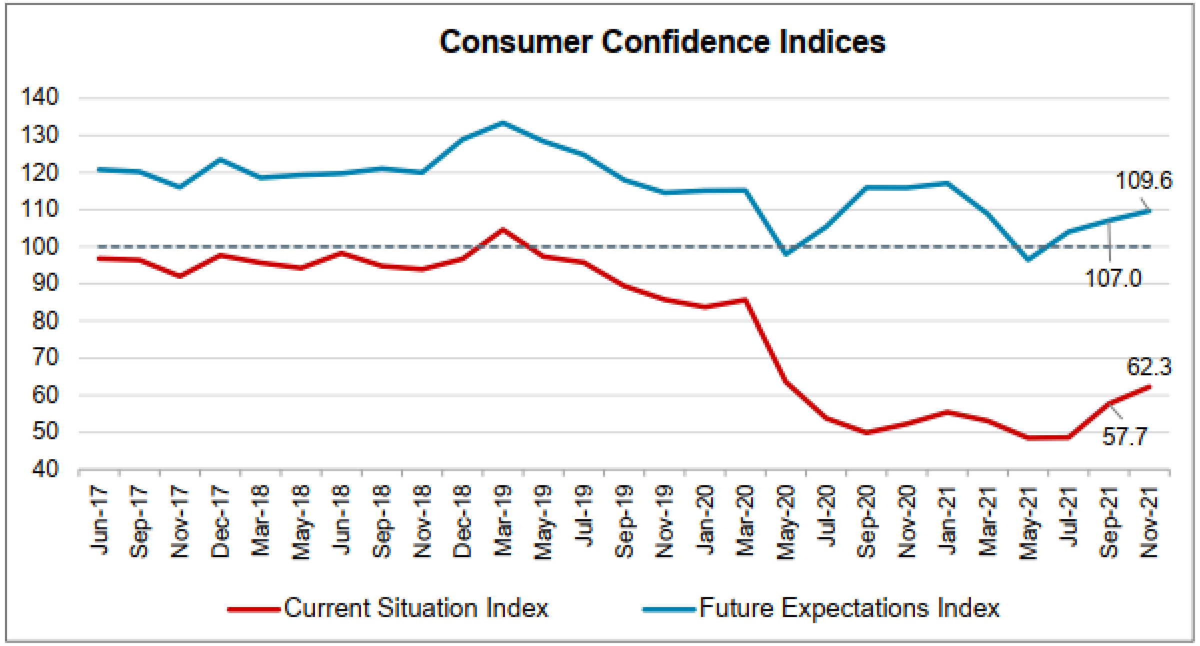
Section

# g. Surveys

- Households' Inflation Expectations Nov 21 round
- Professional Forecasters 73rd Round
- C-Voter
- COVID-19 Community Mobility Reports

# g. Survey - Households' Inflation Expectations Nov 21 round

- Consumer Confidence – divergence between current situation & future expectation



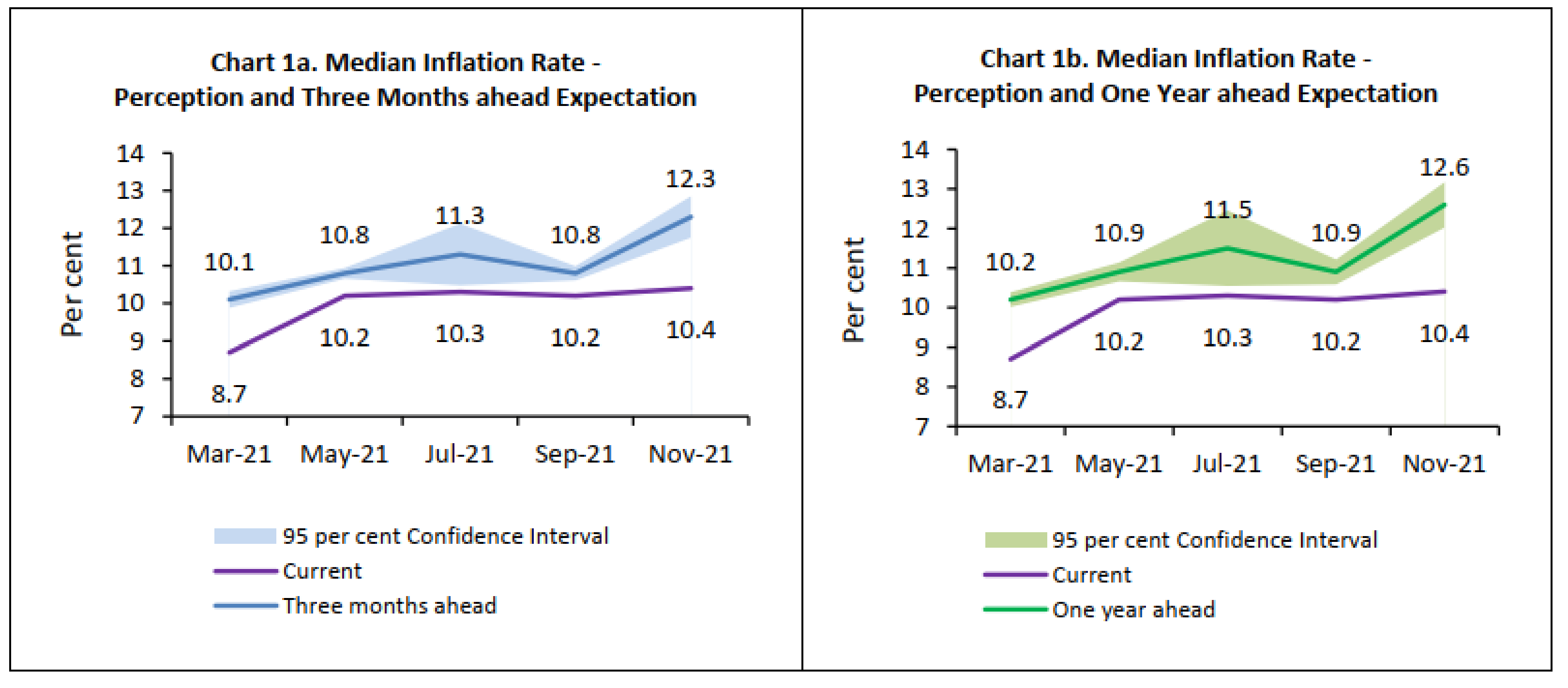

| Summary based on Net Responses | | | | | | |
|---|---|---|---|---|---|---|
| Main Variables | Current Perception compared with one-year ago | | | One year ahead Expectations compared with current situation | | |
| | Sep-21 | Nov-21 | Change | Sep-21 | Nov-21 | Change |
| Economic Situation | -57.4 | -54.2 | ↑ | 1.5 | 5.2 | ↑ |
| Employment | -57.6 | -46.4 | ↑ | 7.9 | 15.4 | ↑ |
| Price Level | -90.6 | -94.5 | ↓ | -64.4 | -66.0 | ↓ |
| Income | -47.8 | -40.6 | ↑ | 31.3 | 35.4 | ↑ |
| Spending | 41.9 | 47.1 | ↑ | 58.8 | 58.2 | ↓ |
| Consumer Confidence Index | **57.7** | **62.3** | ↑ | **107.0** | **109.6** | ↑ |

| | | | |
|---|---|---|---|
| ↑ | **Positive** Sentiments with sign of **improvement** compared to last round | ↑ | **Negative** Sentiments with sign of **improvement** compared to last round |
| ↓ | **Positive** Sentiments with sign of **deterioration** compared to last round | ↓ | **Negative** Sentiments with sign of **deterioration** compared to last round |
| ↔ | **Positive** Sentiments with no change compared to last round | ↔ | **Negative** Sentiments with no change compared to last round |

Source: RBI

# g. Survey - Households' Inflation Expectations Nov 21 round (2)

- Median inflation rates – 3 month and 1 year expectations increasing – increases reflect current inflation increasing




Source: RBI

# g. Survey - Professional Forecasters 73rd Round

**Table 2: Median Growth Forecast of Quarterly GDP, GVA and components** (in per cent)

| | Q3:2021-22 | Q4:2021-22 | Q1:2022-23 | Q2:2022-23 |
|---|---|---|---|---|
| Real GDP | 6.3 (+0.2) | 5.9 (0.0) | 14.0 (+0.9) | 6.5 (+0.4) |
| a. Real PFCE | 6.2 (0.0) | 5.7 (-0.3) | 13.8 (+1.8) | 7.3 (+0.4) |
| b. Real GFCF | 5.5 (+0.3) | 5.4 (+0.4) | 15.4 (+5.4) | 8.0 (+0.6) |
| Real GVA | 5.9 (+0.1) | 4.9 (+0.1) | 12.8 (+3.0) | 5.9 (+0.1) |

**Table 3: Median Forecast of Quarterly Inflation** (in per cent)

| | Q3:2021-22 | Q4:2021-22 | Q1:2022-23 | Q2:2022-23 |
|---|---|---|---|---|
| CPI Combined (General) | 5.0 (+0.3) | 5.8 (+0.1) | 5.2 (+0.2) | 5.2 (+0.3) |
| CPI Combined excluding *food and beverages, pan, tobacco and intoxicants* and *fuel and light* | 6.1 (0.0) | 6.0 (+0.1) | 5.6 (+0.1) | 5.3 (+0.1) |
| WPI All Commodities | 11.7 (+1.9) | 8.9 (+1.8) | 5.5 (+1.3) | 4.8 (+1.0) |
| WPI Non-food Manufactured Products | 11.0 (+1.3) | 8.1 (+1.4) | 4.6 (+1.1) | 3.9 (+1.2) |

**Table 1: Median Forecast of Growth in GDP, GVA and components** (in per cent)

| | 2021-22 | 2022-23 |
|---|---|---|
| Real GDP | 9.5 (+0.1) | 7.6 (+0.8) |
| a. Real PFCE | 9.7 (+0.3) | 8.1 (+0.9) |
| b. Real GFCF | 14.0 (+0.8) | 8.7 (+1.2) |
| Nominal PFCE | 15.1 (-0.4) | 11.6 (+0.4) |
| Real GVA | 8.9 (+0.3) | 6.9 (+0.2) |
| a. Agriculture and Allied Activities | 3.4 (+0.1) | 3.2 (+0.2) |
| b. Industry | 13.0 (+1.5) | 6.8 (+1.0) |
| c. Services | 8.7 (-0.1) | 8.1 (+0.3) |
| Gross Saving Rate *[per cent of gross national disposable income]* | 29.5 (0.0) | 29.8 (0.0) |
| Gross Capital Formation Rate *[per cent of GDP at current market prices]* | 30.0 (0.0) | 30.6 (-0.1) |

Note: The figures in parentheses indicate the extent of revision in median forecasts (percentage points) relative to the previous SPF round (applicable for all Tables).

Source: RBI

# g. Survey – C-Voter

Trepidation about

- Economic condition
- Spending
- Threat of job losses
- Optimism of income hikes
- Business persons expectations

## A confidence crunch

Large headline numbers for economic growth do not capture the downbeat mood of citizens who remain worried about their financial circumstances.

| | NDA voters | Opposition voters | Total (in %) |
|---|---|---|---|
| **Q1: Compared to last year (2020), how optimistic are you about your family's economic condition this year?** | | | |
| Very much optimistic / Family's economic condition to improve | 32.8 | 32.5 | 32.6 |
| Family's economic condition will remain same as last year | 37.9 | 43.5 | 41.3 |
| Family's economic condition will deteriorate | 29.3 | 24.0 | 26.1 |
| **Total** | **100.0** | **100.0** | **100.0** |
| **Q2: Compared to last year, how much did you spend during the festive season this year?** | | | |
| Spent much more than last year | 18.9 | 20.4 | 19.7 |
| Spent same as last year | 31.3 | 32.8 | 32.1 |
| Spent less than last year | 49.8 | 46.8 | 48.2 |
| **Total** | **100.0** | **100.0** | **100.0** |
| **Q3: Compared to last year, what do you think about the threat of job losses this year?** | | | |
| The threat of job losses has decreased significantly | 33.9 | 23.8 | 28.5 |
| The threat of job losses is same as last year | 33.6 | 42.7 | 38.4 |
| The threat of job losses has worsened | 32.6 | 33.5 | 33.1 |
| **Total** | **100.0** | **100.0** | **100.0** |
| **Q4: How optimistic are you about getting a decent hike in salary next year?** | | | |
| Very much sure of getting a decent hike in salary | 22.9 | 17.4 | 20.1 |
| There are some chances of getting a decent hike in salary | 36.6 | 40.4 | 38.6 |
| There is no chance of getting a decent hike in salary | 40.5 | 42.2 | 41.3 |
| **Total** | **100.0** | **100.0** | **100.0** |
| **Q5: As a business person, what are your expectations about your income in the next year?** | | | |
| Expect income to go up significantly | 21.2 | 17.8 | 19.5 |
| Income will remain the same | 39.7 | 44.4 | 42.1 |
| Income will go down | 39.1 | 37.8 | 38.4 |
| **Total** | **100.0** | **100.0** | **100.0** |

Source: C-Voter survey

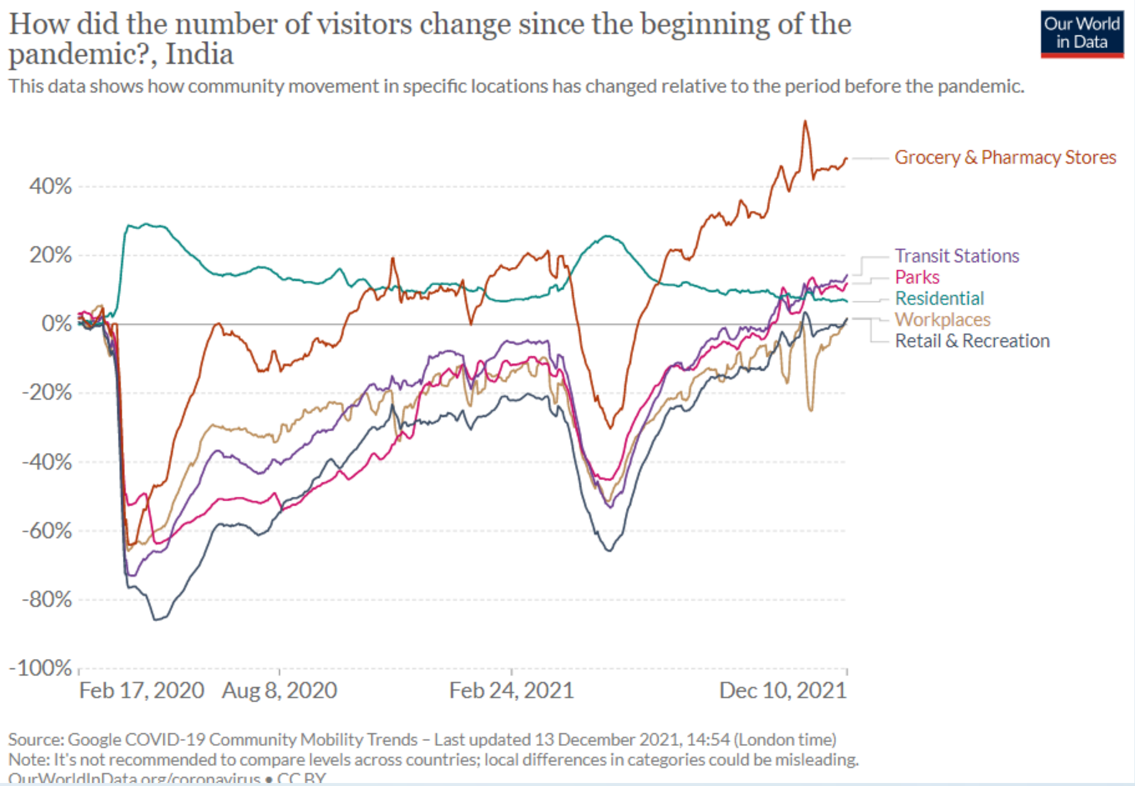
SATISH KUMAR/MINT

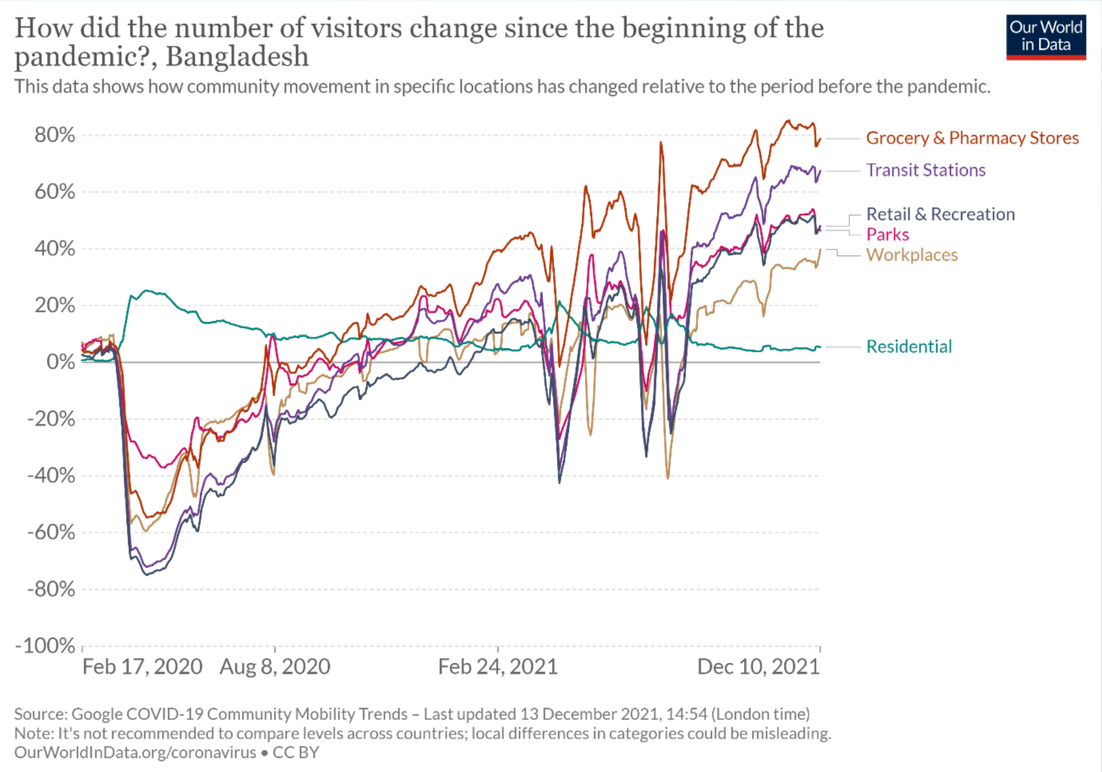


Source: Mint

# g. Survey - COVID-19 Community Mobility Reports

- Mobility: India vs Bangladesh
- Similarity of the 1st wave impact, & difference in the 2nd + wave impact
- Difference in Dec 2021 mobility levels & composition




Source: Our World in Data

# g. Survey - Review

- RBI reported consumer confidence very low & negative but improving, but with positive future expectations
- RBI reported current inflation perception is stable but well above CPI (double), and with expectation that future inflation will rise sharply
- Professional forecasters expect GDP for FY 21-22 to be at 9.5% followed the next year at 7.6%
- Alternative surveys of consumers indicate ambivalence towards economic conditions, but distinctly downbeat perception of future spending, jobs, salary hikes & income
- Physical mobility (tracked by Google) has reverted to 17 Feb 2020 levels. A comparison with Bangladesh shows the latter having a far more robust mobility recovery.

Section

# h. Comments

# h. Comments - Estimations

- During the Covid-19 crisis, data collection was suspended and then gradually updated between April to July 2020. Percent changes based on these periods may not be inaccurate
- GDP aggregated data do not reflect the change in composition of demand by rural and urban segments. Supply data do not reflect change in market shares between informal, MSME & larger corporates segments
- Small scale industry data has been based on estimates since 2016 and its performance both during demonetisation, GST implementation and Covid-19 may not be accurate, based on independent studies conducted
- WPI and CPI composition are different & during Covid-19 crisis their individual composition have changed. Computations using Laspeyres index method may be inaccurate under these conditions.
- Composition of services changed during the crisis and these have changed CPI, and the difference between CPI & WPI

Section

# i. References

# i. References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# About the presenter

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# The End

All sources of data and reports are quoted where applicable. Other computations were produced on a best effort basis. Errors and omissions excepted.

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