

3QFY20 spending grows despite first decline in receipts

Fiscal spending growth in 4QFY20 would be worse

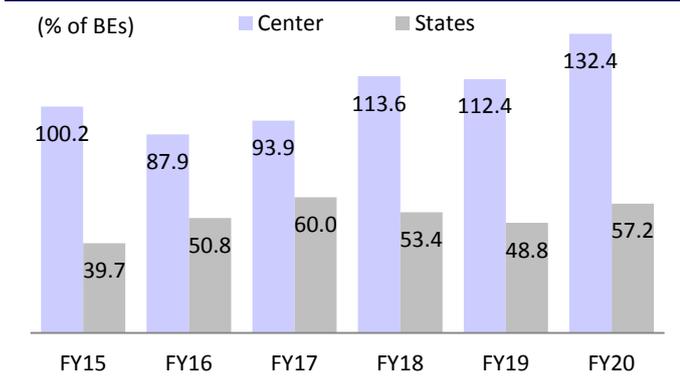
- Based on the monthly data available for 18 major states (accounting for ~90% of all states), we note that their fiscal deficit was at 57.2% of budget estimates (BEs) in 9MFY20, much higher than 48.8% in the corresponding period last year. While tax receipts grew at decadal low of only 1.0% YoY, states' spending grew 9.1% during the same period. Within total spending, revenue spending was up 10.4% YoY while capital spending declined 0.4% YoY in 9MFY20.
- States' tax receipts marked its first decline (of 1.6% YoY) in almost 8 years in 3QFY20. Total receipts, however, grew at a respectable 7.2% YoY in 3QFY20 (lower than 12.5% in 2QFY20), primarily supported by ~80% growth in grants-in-aid from the central government. Total receipts, thus, increased at 9-year low of 6.1% YoY in 9MFY20 and accounted for 59.3% of BEs – the lowest in 5 years.
- States' total spending, however, grew at a slower pace of 9.4% YoY in 3QFY20, compared to 11-quarter high growth of 16.6% in 2QFY20. Within total spending, while capital spending declined 7.5% YoY in 3QFY20, revenue expenditure grew at 12.5% during the quarter. So far (Apr-Dec'19), the states have spent 59% of their budgeted expenditure for FY20.
- Combining the center and states' finances, total tax receipts declined 8.2% and total receipts shrank 4.5% in 3QFY20, marking the first contraction in at least the past 8 years. On the other hand, total spending maintained decent growth of 13.2% during the quarter.
- As discussed earlier, government spending has been a key supporter of economic growth in the past many years. However, unrealistic tax assumptions imply that spending cuts are inevitable in 4QFY20 – same as in the past two years. Although the central government has reduced its receipts by INR1.5t in FY20 RE (revised estimates), we believe that there could still be a shortfall of INR900b this year. Further, since the center has revised down the devolution to states by as much as INR1.5t in FY20, states will definitely feel the heat in 4QFY20. Since the center has guaranteed ~14% growth in tax collection for states till 2021-22, the former will have to bear a larger burden of the economic slowdown. In all certainty, thus, fiscal spending growth should be much lower in 4QFY20.

In this note, we assess the finances of 18 state governments – Andhra Pradesh (AP), Chhattisgarh (CT), Gujarat (GJ), Haryana (HR), Himachal Pradesh (HP), Jharkhand (JH), Karnataka (KA), Kerala (KL), Madhya Pradesh (MP), Maharashtra (MH), Odisha (OD), Punjab (PB), Rajasthan (RJ), Telangana (TS), Tamil Nadu (TN), Uttar Pradesh (UP), Uttarakhand (UK) and West Bengal (WB).

Aggregate fiscal deficit of the general government breached the full-year target by 3.7% of BEs during the first 9 months of the year itself.

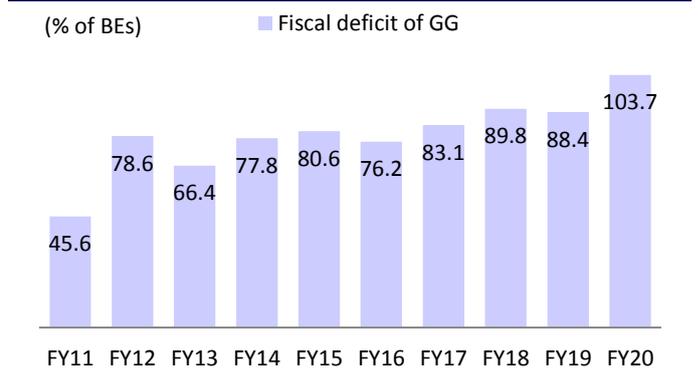
Fiscal deficit of states at 3-year high in Apr-Dec'19...: Fiscal deficit of 18 states reached 57.2% of BEs during Apr-Dec'19, the highest in 3 years and second highest in 10 years (*Exhibit 1*). Moreover, fiscal deficit of the center reached 132.4% of BEs during the corresponding months. Consequently, for the first time in a decade, aggregate fiscal deficit of the general government (center + 18 states) breached the full-year target by 3.7% of BEs during the first 9 months of FY20 itself (*Exhibit 2*).

Exhibit 1: While states' fiscal deficit was at 3-year high, that of the center was highest in two-decades...



Data up to 3Q of respective years

Exhibit 2: ...because of which, general government's full-year deficit target was breached during Apr-Dec'19 itself



Source: Comptroller and Auditor General (CAG), Controller General of Accounts (CGA), Budget documents, CEIC, MOFSL

Exhibit 3: State-wise details of tax collections, revenue expenditure, capital outlay and fiscal deficit

(INR b)	Tax collection		Revenue spending		Capital outlay		Fiscal deficit	
	FY19	FY20	FY19	FY20	FY19	FY20	FY19	FY20
Andhra Pradesh (AP)	642	572	1,020	1,017	166	58	351	352
Chhattisgarh (CG)	301	305	448	541	56	52	75	132
Gujarat (GJ)	748	726	877	996	179	169	100	111
Haryana (HR)	377	377	499	579	164	179	142	195
Himachal Pradesh (HP)	88	90	199	212	18	28	5	9
Jharkhand (JH)	255	274	315	378	67	77	7	17
Karnataka (KA)	946	971	1,028	1,195	165	190	32	87
Kerala (KL)	486	490	821	780	53	68	223	219
Madhya Pradesh (MP)	695	731	1,023	1,045	186	216	263	232
Maharashtra (MH)	1,617	1,663	1,652	2,047	123	175	(129)	73
Odisha (OR)	435	448	581	717	151	117	61	90
Punjab (PB)	308	272	472	472	17	14	98	76
Rajasthan (RJ)	674	688	1,088	1,155	143	109	271	246
Telangana (TS)	583	603	697	746	134	117	146	150
Tamil Nadu (TN)	969	978	1,376	1,493	107	139	281	351
Uttar Pradesh (UP)	139	137	220	238	36	29	52	37
Uttarakhand (UK)	1,761	1,756	1,888	2,079	331	354	34	305
West Bengal (WB)	718	780	976	1,075	94	93	173	150
18 states	11,742	11,860	15,180	16,765	2,191	2,182	2,186	2,833
Central government	9,363	9,049	16,202	18,541	2,118	2,555	7,015	9,317
General Government*	21,106	20,910	31,382	35,306	4,309	4,738	9,200	12,150

Data for Apr-Dec period for both years

Source: CAG, State Finance Ministries (SFMs), CGA, MOFSL

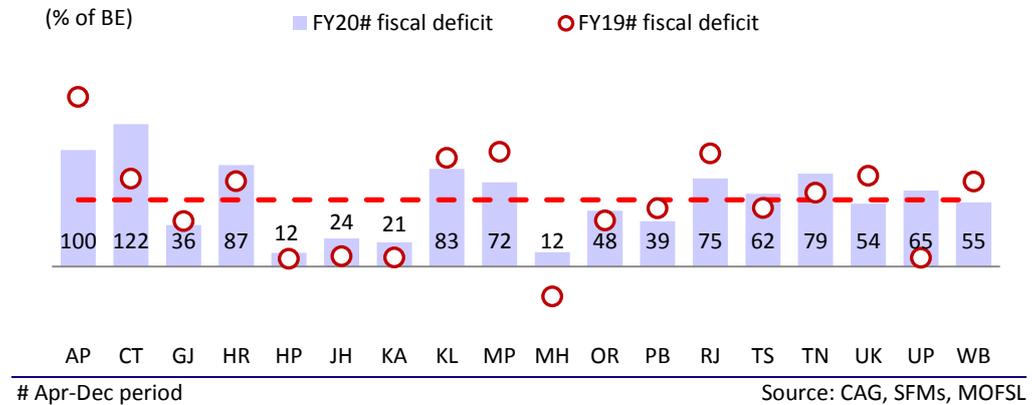
*Center+18 states

All states exhibited fiscal deficit during the first 3 quarters of FY20.

None of the states ran a fiscal surplus during Apr-Dec'19...: Not surprisingly, none of the 18 states posted a fiscal surplus during the first 3 quarters of the year. Notably, Maharashtra (MH) is the only state that transitioned from surplus in 9MFY19 to deficit in 9MFY20 (*Exhibit 3*). While fiscal deficit of Chhattisgarh (CT) has reached a massive 122% of FY20BE, that of Andhra Pradesh (AP) just about reached its FY20 target during Apr-Dec'19. Haryana (HR) and Kerala (KL) have covered 87% and 83% of their respective fiscal deficit targets for FY20 (*Exhibit 4*). Further, as many as 9 states have registered fiscal deficit higher than 57.2% of the BE, which is the average deficit of 18 states taken together. On a positive note, other large states

– Gujarat (GJ), Jharkhand (JH), Maharashtra (MH), Karnataka (KA), Punjab (PB) and Odisha (OD) – still exhibited fiscal deficit lower than 50% of their respective FY20BEs during the 3 quarters ending Dec’19 (*Exhibit 4*).

Exhibit 4: Fiscal deficit of individual states in 9MFY20 vis-à-vis 9MFY19 (% of BE)



Total receipts of states increased 7.2% YoY in 3QFY20 after growing in early-teens a quarter ago, primarily on account of massive 79.6% YoY growth in grants-in-aid given to the states.

Growth in states’ receipts entirely attributable to grants-in-aid in 3QFY20...: Total receipts of 18 states increased 7.2% YoY in 3QFY20 after growing in early-teens a quarter ago, primarily on account of massive 79.6% YoY growth in grants-in-aid received by the states (*Exhibit 5*). While tax receipts of states declined 1.6% YoY in the quarter ending Dec’19, non-tax revenue receipts barely grew during the quarter.

In fact, non-tax receipts grew 23.6% YoY during Apr-Dec’19 only because of 37.1% YoY growth in grants-in-aid as both non-tax revenue receipts and non-debt capital receipts witnessed a decline during 9MFY20 compared to 9MFY19. Accordingly, total receipts during Apr-Dec’19 grew 6.1% YoY due to its non-tax component as taxes during the period also grew by a mere 1% YoY (*Exhibit 6*).

Exhibit 5: Total receipts of states increased primarily due to massive growth in grants-in-aid in 3QFY20...

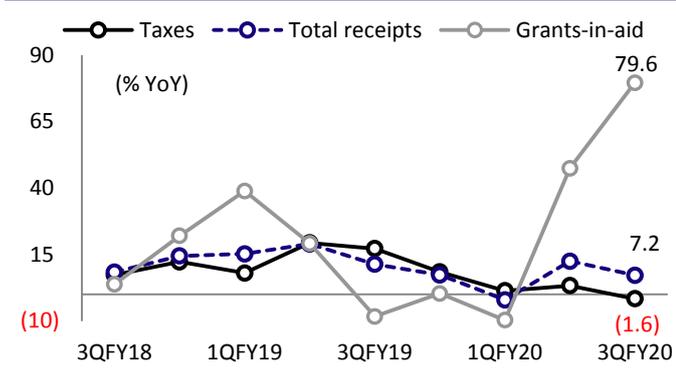
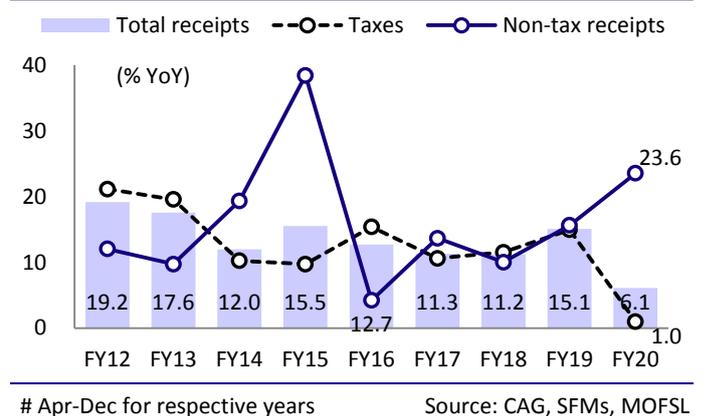
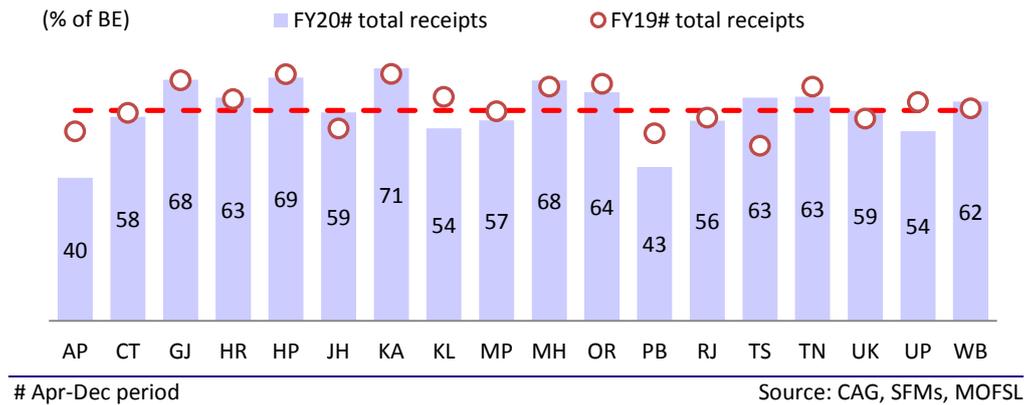


Exhibit 6: ...and that in 9MFY20 was also supported by high growth in total non-tax receipts



A comparison of total receipts of individual states in Apr-Dec’19 with those in Apr-Dec’18 suggests that total receipts improved in 8 of the 18 states (GJ, HR, JH, KA, MH, TS, UK and WB) but weakened in all other states (*Exhibit 7*). While highest collection so far was witnessed in KA, HP and MH at 68-70% of BEs, it was only ~40% of BEs in AP and PB.

Exhibit 7: Total receipts of individual states in 9MFY20 vis-à-vis 9MFY19 (% of BE)



Combined receipts of the center and 18 states declined 4.5% YoY in 3QFY20, marking its first contraction at least since FY13.

...however, total receipts of the general government posted its first decline in 3QFY20: Although grants-in-aid helped states post decent growth in total receipts, combined receipts of the center and 18 states declined 4.5% YoY in 3QFY20, marking its first contraction at least since FY13 (*Exhibit 8*). Aggregated taxes declined 8.2% in 3QFY20.

Total receipts of 18 states, thus, grew at 9-year low of 6.1% YoY in 9MFY20, while total receipts of the central government also grew at a slow pace of only 4.2% YoY during Apr-Dec'19. The center's receipts were primarily supported by strong growth in non-tax revenue receipts. While tax collection of the central government declined 3.4% in the first 9 months of FY20, non-tax receipts grew at decadal high of 40.5% during 9MFY20, mainly because of windfall receipts in the form of dividends from the Reserve Bank of India (RBI) in Aug'19.

Total receipts of the general government grew at an 8-year low of 5.3% YoY during 9MFY20.

Consequently, total receipts of the general government grew at an 8-year low of 5.3% YoY during 9MFY20, way below the 5-year average growth of 12.6%. Considering the general government's total receipts as a percentage of FY20BE, 58.1% has been achieved so far, the slowest pace in 5 years (*Exhibit 9*). As total taxes of the general government declined 0.9% YoY in the 9 months ending Dec'19, only 58% of FY20 has been achieved so far. Additionally, non-tax receipts of the general government grew at 5-year high of 29.7% in Apr-Dec'19, achieving 58.6% of the full-year aim.

Exhibit 8: Total receipts of the general government declined for the first time in 8 years in 3QFY20...

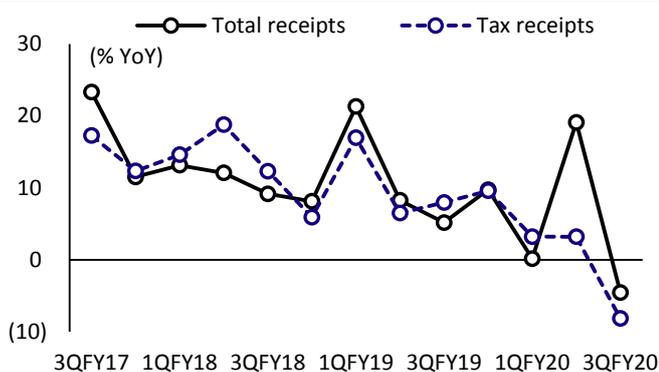
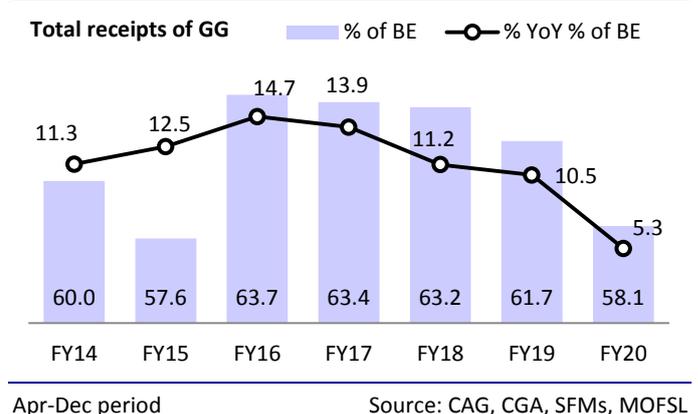


Exhibit 9: ...resulting in 8-year lowest growth of only 5.3% in 9MFY20



States' spending continued its strong growth at 9.4% YoY in 3QFY20, albeit slowly compared to 16.6% growth a quarter ago.

States' spending grew at a slower pace in 3QFY20... As states' receipts were supported by the center's grants-in-aid, its spending continued its strong growth at 9.4% YoY in 3QFY20, albeit at a slow pace compared to 16.6% growth a quarter ago (*Exhibit 10*). Total spending of states grew only 9.1% YoY in 9MFY20, weaker than 13.0% a year ago but much better than 7.4% in FY18. Notably, despite considerable slowdown in spending growth, states managed to achieve 59% of FY20BE, only marginally lower than what was achieved during the same months last year, reflective of the high spending in the previous two quarters of FY20 (*Exhibit 11*).

Exhibit 10: States spending too was slower in 3QFY20...

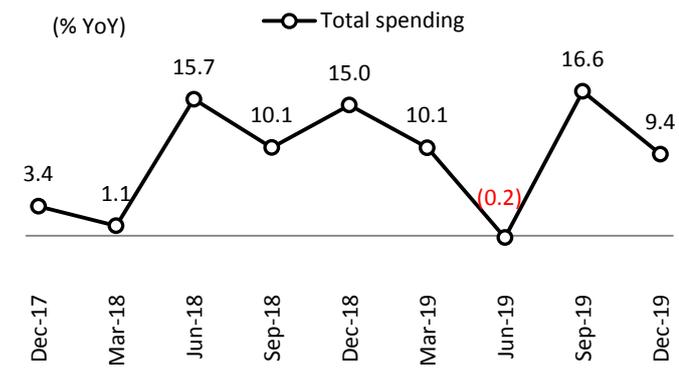
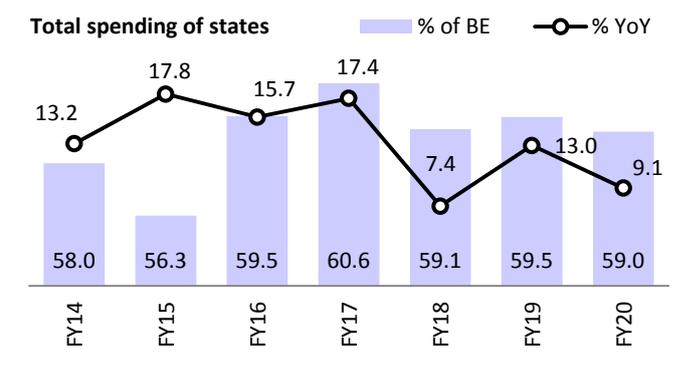


Exhibit 11: ...resulting in slower growth in 9MFY20

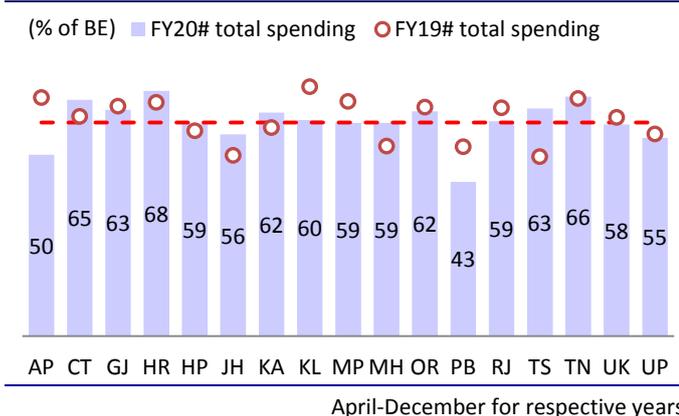


Apr-Dec for respective years Source: CAG, CGA, SFMs, MOFSL

All states, except Punjab and Andhra Pradesh, have spent more than 50% of their targeted spending (FY20BE) during the year.

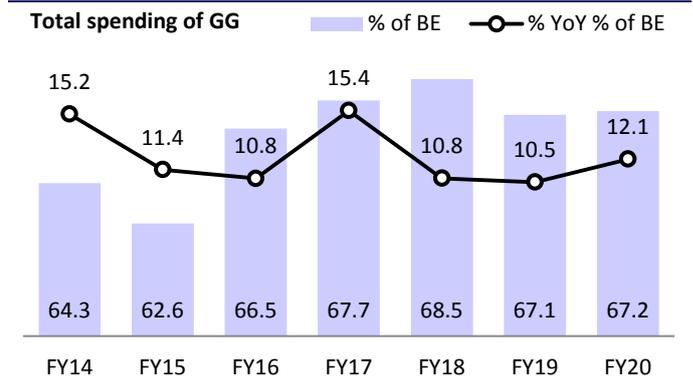
A comparison of total spending of individual states in 9MFY20 with that in 9MFY19 suggests that total spending as a percentage of the BEs increased in only 8 out of the 18 states (CT, HR, HP, JH, KA, MH, TS and TN) (*Exhibit 12*). The highest spender so far has been HR followed by TN and CT at 67.8%, 66.1% and 65.2%, respectively. All states, except AP and PB, have spent more than 50% of their targeted spending (FY20BE) so far during the year.

Exhibit 12: Total spending of individual states in 9MFY20 vis-à-vis 9MFY19



April-December for respective years

Exhibit 13: Total spending of general government saw stronger growth on robust central government spends



Source: CAG, CGA, SFMs, MOFSL

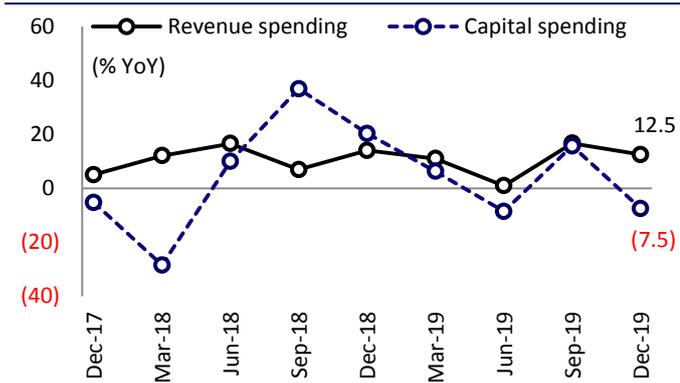
Total spending of the general government grew 12.1% YoY in 9MFY20, achieving 67.2% of BEs.

Similarly, although growth of central government receipts slowed down, its spending grew rather fast at 15.2% YoY in Apr-Dec'19, led by robust capital spending by the central government. As a result, total spending of the general government actually increased 12.1% YoY in the 9 months ending Dec'19, thus achieving 67.2% of FY20BE, similar to that of the previous year but lower than 68.5% achieved in FY18 (*Exhibit 13*).

Contrary to the trend seen in central government finances, states' capital spending declined and revenue spending grew at a decent pace in 3QFY20.

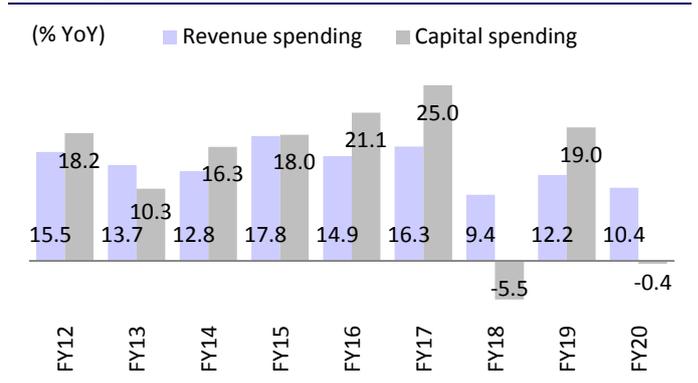
...with the axe falling on capital spending: Contrary to the trend seen in central government finances, states' capital spending declined and revenue spending grew at a decent pace in 3QFY20. While capital spending of states declined 7.5%, revenue spending grew 12.5% in 3QFY20 (albeit slower than 16.7% in 2QFY20 but way higher than just 1% in 1QFY20) (*Exhibit 14*). Consequently, capital spending incurred by states actually declined 0.4% YoY in 9MFY20 and revenue spending, although slower than a year ago, grew fairly well at 10.4% YoY (*Exhibit 15*).

Exhibit 14: States majorly cut their spending on the capital side in 3QFY20...



Source: CAG, SFMs, MOFSL

Exhibit 15: ...leading to an overall 0.4% decline in capital spending in 9MFY20



April-December for respective years

Conclusion: Fiscal spending growth in 4QFY20 to be much slower

Notwithstanding the first contraction in 8 years in total receipts of the general government (center + 18 states), spending growth of 13.2% YoY was remarkable in 3QFY20. This suggests that the governments – center and states – have front-loaded their spending in FY20, supporting growth in 1HFY20.

As discussed [earlier](#), government spending has been a key supporter of economic growth in the past many years. However, unrealistic tax assumptions imply that spending cuts are inevitable in 4QFY20 – same as in the past 2 years. Although the central government has reduced its receipts by INR1.5t in FY20 RE (revised estimates), we [believe](#) that there could still be a shortfall of INR900b this year. Further, since the center has revised down the devolution to states by as much as INR1.5t in FY20, states will definitely feel the heat in 4QFY20. Since the center has guaranteed ~14% growth in tax collection for states till 2021-22, the former has to bear a larger burden of the economic slowdown compared to the latter. In all certainty, thus, fiscal spending growth in 4QFY20 should be much lower.

Appendix

Exhibit 16: State-wise details of growth in tax collections, revenue expenditure and capital expenditure (% YoY)#

(% YoY)	Tax collection		Core revenue spending		Capital Outlay	
	FY19	FY20	FY19	FY20	FY19	FY20
Andhra Pradesh (AP)	21.9	(10.9)	15.2	(1.1)	18.4	(64.9)
Chhattisgarh (CT)	12.8	1.3	9.9	18.8	(4.3)	(8.6)
Gujarat (GJ)	14.1	(3.0)	12.6	13.3	32.6	(5.5)
Haryana (HR)	5.0	0.1	3.6	19.0	26.5	9.3
Himachal Pradesh (HP)	4.7	2.4	12.5	7.2	4.3	55.2
Jharkhand (JH)	19.8	7.4	(3.4)	18.9	(6.0)	14.2
Karnataka (KA)	12.2	2.7	7.4	15.6	6.7	14.9
Kerala (KL)	13.4	0.8	12.8	(6.6)	9.7	27.0
Madhya Pradesh (MP)	10.5	5.2	21.3	1.1	18.2	16.1
Maharashtra (MH)	14.5	2.9	7.2	27.3	(4.8)	41.7
Odisha (OR)	9.2	3.0	26.5	24.2	13.7	(22.6)
Punjab (PB)	3.9	(11.7)	13.6	1.9	32.4	(17.8)
Rajasthan (RJ)	14.6	2.1	28.3	5.7	43.6	(24.1)
Tamil Nadu (TN)	16.0	3.4	9.6	5.8	(18.7)	(13.0)
Telangana (TR)	14.7	0.9	17.1	8.2	24.7	29.9
Uttarakhand (UK)	17.4	(1.3)	12.5	8.0	(1.7)	(18.7)
Uttar Pradesh (UP)	19.5	(0.3)	7.7	10.4	80.6	7.0
West Bengal (WB)	25.4	8.7	5.8	8.1	13.4	(0.8)
18 state governments	14.9	1.0	12.3	10.5	19.0	(0.4)
Central government	4.0	(3.4)	10.2	19.2	(10.5)	20.6
General Government*	9.8	(0.9)	11.3	14.6	2.4	9.9

April-December period

*Center+18 states

Source: CAG, SFMs, CGA, MOFSL

NOTES

Investment Rating	Expected return (over 12-month)
BUY	>=15%
SELL	< - 10%
NEUTRAL	> - 10 % to 15%
UNDER REVIEW	Rating may undergo a change
NOT RATED	We have forward looking estimates for the stock but we refrain from assigning recommendation

*In case the recommendation given by the Research Analyst is inconsistent with the investment rating legend for a continuous period of 30 days, the Research Analyst shall within following 30 days take appropriate measures to make the recommendation consistent with the investment rating legend.

Disclosures:

The following Disclosures are being made in compliance with the SEBI Research Analyst Regulations 2014 (herein after referred to as the Regulations).

Motilal Oswal Financial Services Ltd. (MOFSL) is a SEBI Registered Research Analyst having registration no. INH000000412. MOFSL, the Research Entity (RE) as defined in the Regulations, is engaged in the business of providing Stock broking services, Investment Advisory Services, Depository participant services & distribution of various financial products. MOFSL is a subsidiary company of Passionate Investment Management Pvt. Ltd., (PIMPL). MOFSL is a listed public company, the details in respect of which are available on www.motilaloswal.com. MOFSL (erstwhile Motilal Oswal Securities Limited - MOFSL) is registered with the Securities & Exchange Board of India (SEBI) and is a registered Trading Member with National Stock Exchange of India Ltd. (NSE) and Bombay Stock Exchange Limited (BSE), Multi Commodity Exchange of India Limited (MCX) and National Commodity & Derivatives Exchange Limited (NCDEX) for its stock broking activities & is Depository participant with Central Depository Services Limited (CDSL) National Securities Depository Limited (NSDL), NERL, COMRIS and CCRL and is member of Association of Mutual Funds of India (AMFI) for distribution of financial products and Insurance Regulatory & Development Authority of India (IRDA) as Corporate Agent for insurance products. Details of associate entities of Motilal Oswal Financial Services Limited are available on the website at <http://online-reports.motilaloswal.com/Dormant/documents/Associate%20Details.pdf>

Details of pending Enquiry Proceedings of Motilal Oswal Financial Services Limited are available on the website at <https://galaxy.motilaloswal.com/ResearchAnalyst/PublishViewLitigation.aspx>

MOFSL, its associates, Research Analyst or their relative may have any financial interest in the subject company. MOFSL and/or its associates and/or Research Analyst may have actual/beneficial ownership of 1% or more securities in the subject company in the past 12 months. MOFSL and its associate company(ies), their directors and Research Analyst and their relatives may; (a) from time to time, have a long or short position in, act as principal in, and buy or sell the securities or derivatives thereof of companies mentioned herein. (b) be engaged in any other transaction involving such securities and earn brokerage or other compensation or act as a market maker in the financial instruments of the company(ies) discussed herein or act as an advisor or lender/borrower to such company(ies) or may have any other potential conflict of interests with respect to any recommendation and other related information and opinions.; however the same shall have no bearing whatsoever on the specific recommendations made by the analyst(s), as the recommendations made by the analyst(s) are completely independent of the views of the associates of MOFSL even though there might exist an inherent conflict of interest in some of the stocks mentioned in the research report. Research Analyst may have served as director/officer, etc. in the subject company in the past 12 months. MOFSL and/or its associates may have received any compensation from the subject company in the past 12 months.

In the past 12 months, MOFSL or any of its associates may have:

1. managed or co-managed public offering of securities from subject company of this research report,
2. received compensation for investment banking or merchant banking or brokerage services from subject company of this research report,
3. received compensation for products or services other than investment banking or merchant banking or brokerage services from the subject company of this research report.
4. Subject Company may have been a client of MOFSL or its associates in the past 12 months.

MOFSL and its associates have not received any compensation or other benefits from the subject company or third party in connection with the research report. To enhance transparency, MOFSL has incorporated a Disclosure of Interest Statement in this document. This should, however, not be treated as endorsement of the views expressed in the report. MOFSL and / or its affiliates do and seek to do business including investment banking with companies covered in its research reports. As a result, the recipients of this report should be aware that MOFSL may have a potential conflict of interest that may affect the objectivity of this report. Compensation of Research Analysts is not based on any specific merchant banking, investment banking or brokerage service transactions. Above disclosures include beneficial holdings lying in demat account of MOFSL which are opened for proprietary investments only. While calculating beneficial holdings, It does not consider demat accounts which are opened in name of MOFSL for other purposes (i.e holding client securities, collaterals, error trades etc.). MOFSL also earns DP income from clients which are not considered in above disclosures. Above disclosures include beneficial holdings lying in demat account of MOFSL which are opened for proprietary investments only. While calculating beneficial holdings, It does not consider demat accounts which are opened in name of MOFSL for other purposes (i.e holding client securities, collaterals, error trades etc.). MOFSL also earns DP income from clients which are not considered in above disclosures.

Terms & Conditions:

This report has been prepared by MOFSL and is meant for sole use by the recipient and not for circulation. The report and information contained herein is strictly confidential and may not be altered in any way, transmitted to, copied or distributed, in part or in whole, to any other person or to the media or reproduced in any form, without prior written consent of MOFSL. The report is based on the facts, figures and information that are considered true, correct, reliable and accurate. The intent of this report is not recommendatory in nature. The information is obtained from publicly available media or other sources believed to be reliable. Such information has not been independently verified and no guaranty, representation of warranty, express or implied, is made as to its accuracy, completeness or correctness. All such information and opinions are subject to change without notice. The report is prepared solely for informational purpose and does not constitute an offer document or solicitation of offer to buy or sell or subscribe for securities or other financial instruments for the clients. Though disseminated to all the customers simultaneously, not all customers may receive this report at the same time. MOFSL will not treat recipients as customers by virtue of their receiving this report.

Analyst Certification

The views expressed in this research report accurately reflect the personal views of the analyst(s) about the subject securities or issues, and no part of the compensation of the research analyst(s) was, is, or will be directly or indirectly related to the specific recommendations and views expressed by research analyst(s) in this report.

Disclosure of Interest Statement	Companies where there is interest
Analyst ownership of the stock	No

A graph of daily closing prices of securities is available at www.nseindia.com, www.bseindia.com. Research Analyst views on Subject Company may vary based on Fundamental research and Technical Research. Proprietary trading desk of MOFSL or its associates maintains arm's length distance with Research Team as all the activities are segregated from MOFSL research activity and therefore it can have an independent view with regards to subject company for which Research Team have expressed their views.

Regional Disclosures (outside India)

This report is not directed or intended for distribution to or use by any person or entity resident in a state, country or any jurisdiction, where such distribution, publication, availability or use would be contrary to law, regulation or which would subject MOFSL & its group companies to registration or licensing requirements within such jurisdictions.

For Hong Kong:

This report is distributed in Hong Kong by Motilal Oswal capital Markets (Hong Kong) Private Limited, a licensed corporation (CE AYY-301) licensed and regulated by the Hong Kong Securities and Futures Commission (SFC) pursuant to the Securities and Futures Ordinance (Chapter 571 of the Laws of Hong Kong) "SFO". As per SEBI (Research Analyst Regulations) 2014 Motilal Oswal Financial Services Limited (SEBI Reg No. INH000000412) has an agreement with Motilal Oswal capital Markets (Hong Kong) Private Limited for distribution of research report in Hong Kong. This report is intended for distribution only to "Professional Investors" as defined in Part I of Schedule 1 to SFO. Any investment or investment activity to which this document relates is only available to professional investor and will be engaged only with professional investors." Nothing here is an offer or solicitation of these securities, products and services in any jurisdiction where their offer or sale is not qualified or exempt from registration. The Indian Analyst(s) who compile this report is/are not located in Hong Kong & are not conducting Research Analysis in Hong Kong.

For U.S.:

Motilal Oswal Financial Services Limited (MOFSL) is not a registered broker - dealer under the U.S. Securities Exchange Act of 1934, as amended (the "1934 act") and under applicable state laws in the United States. In addition MOFSL is not a registered investment adviser under the U.S. Investment Advisers Act of 1940, as amended (the "Advisers Act" and together with the 1934 Act, the "Acts"), and under applicable state laws in the United States. Accordingly, in the absence of specific exemption under the Acts, any brokerage and investment services provided by MOFSL, including the products and services described herein are not available to or intended for U.S. persons. This report is intended for distribution only to "Major Institutional Investors" as defined by Rule 15a-6(b)(4) of the Exchange Act and interpretations thereof by SEC (henceforth referred to as "major institutional investors"). This document must not be acted on or relied on by persons who are not major institutional investors. Any investment or investment activity to which this document relates is only available to major institutional investors and will be engaged in only with major institutional investors. In reliance on the exemption from registration provided by Rule 15a-6 of the U.S. Securities Exchange Act of 1934, as amended (the "Exchange Act") and interpretations thereof by the U.S. Securities and Exchange Commission ("SEC") in order to conduct business with Institutional Investors based in the U.S., MOFSL has entered into a chaperoning agreement with a U.S. registered broker-dealer, Motilal Oswal Securities International Private Limited. ("MOSIPL"). Any business interaction pursuant to this report will have to be executed within the provisions of this chaperoning agreement.

The Research Analysts contributing to the report may not be registered /qualified as research analyst with FINRA. Such research analyst may not be associated persons of the U.S. registered broker-dealer, MOSIPL, and therefore, may not be subject to NASD rule 2711 and NYSE Rule 472 restrictions on communication with a subject company, public appearances and trading securities held by a research analyst account.

For Singapore:

In Singapore, this report is being distributed by Motilal Oswal Capital Markets Singapore Pte Ltd ("MOCMSPL") (Co.Reg. NO. 201129401Z) which is a holder of a capital markets services license and an exempt financial adviser in Singapore, as per the approved agreement under Paragraph 9 of Third Schedule of Securities and Futures Act (CAP 289) and Paragraph 11 of First Schedule of Financial Advisors Act (CAP 110) provided to MOCMSPL by Monetary Authority of Singapore. Persons in Singapore should contact MOCMSPL in respect of any matter arising from, or in connection with this report/publication/communication. This report is distributed solely to persons who qualify as "Institutional Investors", of which some of whom may consist of "accredited" institutional investors as defined in section 4A(1) of the Securities and Futures Act, Chapter 289 of Singapore ("the SFA"). Accordingly, if a Singapore person is not or ceases to be such an institutional investor, such Singapore Person must immediately discontinue any use of this Report and inform MOCMSPL.

Disclaimer: The report and information contained herein is strictly confidential and meant solely for the selected recipient and may not be altered in any way, transmitted to, copied or distributed, in part or in whole, to any other person or to the media or reproduced in any form, without prior written consent. This report and information herein is solely for informational purpose and may not be used or considered as an offer document or solicitation of offer to buy or sell or subscribe for securities or other financial instruments. Nothing in this report constitutes investment, legal, accounting and tax advice or a representation that any investment or strategy is suitable or appropriate to your specific circumstances. The securities discussed and opinions expressed in this report may not be suitable for all investors, who must make their own investment decisions, based on their own investment objectives, financial positions and needs of specific recipient. This may not be taken in substitution for the exercise of independent judgment by any recipient. Each recipient of this document should make such investigations as it deems necessary to arrive at an independent evaluation of an investment in the securities of companies referred to in this document (including the merits and risks involved), and should consult its own advisors to determine the merits and risks of such an investment. The investment discussed or views expressed may not be suitable for all investors. Certain transactions -including those involving futures, options, another derivative products as well as non-investment grade securities - involve substantial risk and are not suitable for all investors. No representation or warranty, express or implied, is made as to the accuracy, completeness or fairness of the information and opinions contained in this document. The Disclosures of Interest Statement incorporated in this document is provided solely to enhance the transparency and should not be treated as endorsement of the views expressed in the report. This information is subject to change without any prior notice. The Company reserves the right to make modifications and alternations to this statement as may be required from time to time without any prior approval. MOFSL, its associates, their directors and the employees may from time to time, effect or have effected an own account transaction in, or deal as principal or agent in or for the securities mentioned in this document. They may perform or seek to perform investment banking or other services for, or solicit investment banking or other business from, any company referred to in this report. Each of these entities functions as a separate, distinct and independent of each other. The recipient should take this into account before interpreting the document. This report has been prepared on the basis of information that is already available in publicly accessible media or developed through analysis of MOFSL. The views expressed are those of the analyst, and the Company may or may not subscribe to all the views expressed therein. This document is being supplied to you solely for your information and may not be reproduced, redistributed or passed on, directly or indirectly, to any other person or published, copied, in whole or in part, for any purpose. This report is not directed or intended for distribution to, or use by, any person or entity who is a citizen or resident or located in any locality, state, country or other jurisdiction, where such distribution, publication, availability or use would be contrary to law, regulation or which would subject MOFSL to any registration or licensing requirement within such jurisdiction. The securities described herein may or may not be eligible for sale in all jurisdictions or to certain category of investors. Persons in whose possession this document may come are required to inform themselves of and to observe such restriction. Neither the Firm, not its directors, employees, agents or representatives shall be liable for any damages whether direct or indirect, incidental, special or consequential including lost revenue or lost profits that may arise from or in connection with the use of the information. The person accessing this information specifically agrees to exempt MOFSL or any of its affiliates or employees from, any and all responsibility/liability arising from such misuse and agrees not to hold MOFSL or any of its affiliates or employees responsible for any such misuse and further agrees to hold MOFSL or any of its affiliates or employees free and harmless from all losses, costs, damages, expenses that may be suffered by the person accessing this information due to any errors and delays.

Registered Office Address: Motilal Oswal Tower, Rahimtullah Sayani Road, Opposite Parel ST Depot, Prabhadevi, Mumbai-400025; Tel No.: 022 71934200/ 022-71934263; Website www.motilaloswal.com.

CIN No.: L67190MH2005PLC153397. Correspondence Office Address: Palm Spring Centre, 2nd Floor, Palm Court Complex, New Link Road, Malad(West), Mumbai- 400 064. Tel No: 022 7188 1000.

Registration Nos.: Motilal Oswal Financial Services Limited (MOFSL)*: INZ000158836(BSE/NSE/MCX/NCDEX); CDSL and NSDL: IN-DP-16-2015; Research Analyst: INH000000412. AMFI: ARN - 146822; Investment Adviser: INA000007100; Insurance Corporate Agent: CA0579 ;PMS:INP000006712. Motilal Oswal Asset Management Company Ltd. (MOAMC): PMS (Registration No.: INP000000670); PMS and Mutual Funds are offered through MOAMC which is group company of MOFSL. Motilal Oswal Wealth Management Ltd. (MOWML): PMS (Registration No.: INP000004409) is offered through MOWML, which is a group company of MOFSL. Motilal Oswal Financial Services Limited is a distributor of Mutual Funds, PMS, Fixed Deposit, Bond, NCDs, Insurance Products and IPOs. Real Estate is offered through Motilal Oswal Real Estate Investment Advisors II Pvt. Ltd. which is a group company of MOFSL. Private Equity is offered through Motilal Oswal Private Equity Investment Advisors Pvt. Ltd which is a group company of MOFSL. Research & Advisory services is backed by proper research. Please read the Risk Disclosure Document prescribed by the Stock Exchanges carefully before investing. There is no assurance or guarantee of the returns. Investment in securities market is subject to market risk, read all the related documents carefully before investing. Details of Compliance Officer: Name: Neeraj Agarwal, Email ID: na@motilaloswal.com, Contact No.:022-71881085.

* MOFSL has been amalgamated with Motilal Oswal Financial Services Limited (MOFSL) w.e.f August 21, 2018 pursuant to order dated July 30, 2018 issued by Hon'ble National Company Law Tribunal, Mumbai Bench.