

# Infosys

14 April 2018

Reuters: INFY.BO; Bloomberg: INFO IN

## Past Underinvestment Comes Back To Bite; Renewal TCV Skew Poses Growth Risk; Capital Return To Support Stock

The 4QFY18 performance of Infosys was broadly in line, with revenues being slightly weaker and margins being a tad better than expected. Importantly, Infosys gave FY19 revenue guidance of 6%-8% in constant currency or CC terms (7%-9% in USD terms) – broadly in line with street expectation but a tad above our CC estimate of 5%-7%. It had delivered 5.8%/7.2% growth in CC/USD terms, respectively, in FY18. Infosys indicated that the revenue growth guidance is purely organic and does not include any acquisitions or any material revenues from Skava and Panaya which are likely to be sold in FY19. Infosys lowered its margin guidance from 23%-25% in FY18 (delivered 24.3%) to 22%-24% for FY19 (in line with our expectation but 100bps below consensus estimate) in the wake of: (1) Increased investment in hitherto underinvested digital areas. (2) Increased investment in local hiring, especially in the US. (3) Revitalisation of sales capabilities in digital and in Europe. (4) Re-skilling of its employee base on digital technologies. The new margin guidance does not incorporate likely dilution from incremental acquisitions. The margin compression corroborates our long-held view that Indian companies have been under-investing in 'new areas' in order to protect margins to the detriment of market share. With Skava and Panaya being put on the block, Infosys indicates a shift back to the pure services model from people + software model that was being espoused by the former CEO, Dr. Vishal Sikka. The investments, M&A strategy and management commentary seems to indicate a renewed focus on digital services. We believe the 35%-55% lower 'new deal' TCV (based on our estimates) could pose a risk to what seems to be a modest revenue guidance unless there is strong TCV addition in 1HFY19. The stock could, however, find support in the aggressive capital return policy enunciated by Infosys in FY19. Besides the usual 70% of annual free cash flow or FCF which will be distributed to shareholders, Infosys indicated distribution of an incremental US\$2bn from its ~US\$5bn cash hoard. Of this, US\$400mn will be through a special dividend in June 2018. The form in which US\$1.6bn will be distributed is yet to be decided. A buyback of that amount (a reduction in share count by ~4%) is possible by 4QFY19. This has the potential to push up EPS in FY20. Post 4QFY18 results, we have maintained our USD revenue growth rate of ~6% for FY19 against the company's guidance of 7%-9% as we are yet to be convinced of a growth pick-up because of challenges in the US BFS, Retail and Manufacturing sectors in FY19 and poor new deal TCV. We continue to hold on to our below-consensus margin estimates. We have taken the view that US\$1.6bn will be used for a buyback and hence have decreased both the share count and other income estimates for FY20. Our target P/E remains at 16.3x FY20E EPS (20% discount to that of TCS). We believe Infosys should trade at a discount as it would have lower organic growth, margins and RoIC than TCS in FY19. We continue with Accumulate rating initiated in our recent sector update ([Turning Tactically Positive](#)). We prefer TCS and HCL Technologies over Infosys in FY19 as we expect better organic growth from them.

**New strategy revolves around digital:** As regards its renewed strategy, Infosys stated that it will focus on: (1) Scaling its digital business which contributed 25.5% (~US\$2.8bn) to its revenues in FY18. (2) Energising its core services with the help of AI and automation platform 'Nia'. (3) Re-skilling of its employees by providing them anytime anywhere learning platforms. (4) Increasing localisation in the US, Europe, and Australia by scaling up local talent and building local delivery centres.

Y/E March (Rsmn)	4QFY17	3QFY18	4QFY18	YoY (%)	QoQ (%)	4QFY18E	Dev (%)
Net Sales (USD mn)	2,566	2,755	2,806	9.4	1.9	2,814	(0.3)
Net Sales	1,71,200	1,77,940	1,80,830	5.6	1.6	1,80,941	(0.1)
Software Development Expenses	1,07,700	1,14,500	1,15,540	7.3	0.9	1,15,547	(0.0)
% of Sales	62.9	64.3	63.9	-	-	63.9	-
SG&A	21,380	20,250	20,570	(3.8)	1.6	21,170	(2.8)
% of Sales	12.5	11.4	11.4	-	-	11.7	-
EBIT	42,120	43,190	44,720	6.2	3.5	44,224	1.1
EBIT Margin (%)	24.6	24.3	24.7	-	-	24.4	-
Other Income	7,210	9,620	6,520	(9.6)	(32.2)	5,080	28.3
PBT	49,330	52,810	51,240	3.9	(3.0)	49,304	3.9
Provision for Tax	13,300	15,840	13,470	1.3	(15.0)	13,805	(2.4)
Effective Tax Rate	27.0	30.0	26.3	-	-	28.0	-
PAT (adjusted)	36,030	36,970	37,770	4.8	2.2	35,499	6.4
Exceptional items	0	14,320	-870	-	-	0	-
PAT (reported)	36,030	51,290	36,900	2.4	(28.1)	35,499	3.9
NPM (%)	21.0	20.8	20.9	-	-	19.6	-

Source: Company, Nirmal Bang Institutional Equities Research

## ACCUMULATE

Sector: Information Technology

CMP: Rs1,171

Target price: Rs1,157

Downside: 1.3%

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### Key Data

Current Shares O/S (mn)	2,184.1
Mkt Cap (Rsbn/US\$bn)	2,558.6/39.2
52 Wk H / L (Rs)	1,221/860
Daily Vol. (3M NSE Avg.)	5,200,024

### Price Performance (%)

	1 M	6 M	1 Yr
Infosys	(1.0)	25.9	25.8
Nifty Index	0.5	3.1	14.5

Source: Bloomberg

## Exhibit 1: Key financials

Y/E March (Rsbn)	FY17	FY18	FY19E	FY20E	FY21E
Revenue (Rsbn)	685	705	767	810	856
YoY Growth (%)	9.7	3.0	8.7	5.6	5.7
EBIT (Rsbn)	169	171	177	184	197
EBIT (%)	24.7	24.3	23.1	22.7	23.1
Adj. PAT (Rsbn)	144	147	150	148	161
YoY Growth (%)	6.4	2.3	1.8	(1.0)	8.5
FDEPS-Adjusted (Rs)	66.0	65.0	68.8	70.9	76.9
ROE (%)	22.0	21.9	24.8	25.3	24.9
ROCE (%)	30.5	30.5	34.0	34.7	34.2
ROIC (%)	51.1	44.9	44.6	44.3	45.1
P/E (x)	17.7	18.0	17.0	16.5	15.2
P/BV (x)	3.9	3.9	4.6	4.0	3.6

Source: Company, Nirmal Bang Institutional Equities Research

## Exhibit 2: Change in our estimates

	New			Old			Change (%)		
	FY19E	FY20E	FY21E	FY19E	FY20E	FY21E	FY19E	FY20E	FY21E
INR/USD	66.0	66.1	70.0	66.0	66.1	70.0	-	-	-
USD Revenue (USD mn)	11,617	12,250	12,224	11,596	12,220	12,198	0.2	0.2	0.2
Revenue (Rsbn)	767	810	856	765	808	854	0.2	0.2	0.2
EBIT (Rsbn)	177	184	197	180	185	200	(1.3)	(0.9)	(1.1)
EBIT Margin (%)	23.1	22.7	23.1	23.5	23.0	23.4	-	-	-
PAT Adjusted (Rsbn)	150	148	161	147	154	168	1.7	(3.7)	(4.1)
FDEPS-Adjusted (Rs)	68.8	70.9	76.9	67.6	70.7	77.1	1.6	0.2	(0.2)

Source: Company, Nirmal Bang Institutional Equities Research

**View on the sector:** We recently turned '**tactically positive**' on the Indian IT services sector for the next 12 months after having been negative on it for close to three years (see the report [here](#)). This change in stance has been driven by: (1) A modest growth pick-up because of a peaking developed market economic cycle in 2018 that has also been boosted by US tax reforms. (2) Large underweight institutional positioning in the sector. (3) Continued strong domestic equity flows. (4) Near-term negative news flow on 'financials' (a large overweight sector for institutions). (5) Better relative valuation (which is no longer as compelling as it was three to four months ago). Around 80% of the upward revision to our coverage universe's expected market capitalisation has been from P/E multiple expansion and only 20% has come from revision in earnings. The P/E multiple expansion has been/will be driven by paucity of investment options because of continued strong inflow of domestic money into equities, expensive valuation of popular themes (private financials, consumer staples, consumer discretionary, etc) and near-term challenges faced by 'Financials' from higher interest rates and higher stressed asset provisioning. Having said that, **structurally, we believe the earnings growth of Tier-1 companies will be in mid-high single-digit at best over FY18-FY20E, and believe the sector is still not an attractive bet for long-term investors looking for fast earnings compounders.** Structural pressures that we have been harping on for the past three years will continue to constrain growth. These include value compression and cannibalisation from automation (which is reaching enterprise scale, in our view, countering upside from digital projects which are also scaling up) and movement to cloud, a weaker but improving competitive position in 'new areas', insourcing, etc. These pressures have led to growth pick-up being pushed back to the last stage of this economic upcycle. The street is anticipating a uniform pick-up in growth over FY18-FY20E across Tier-1 companies. We disagree and believe that growth will be dispersed in FY19. In our coverage universe, we believe TCS and HCL Technologies will outperform their Tier-1 peers in organic revenue growth. Contrary to consensus expectations, we expect Infosys to disappoint on the growth front in FY19. For Wipro and Tech Mahindra, organic growth, in our view, will remain muted. We prefer large-caps over mid-caps at current valuation. Mid-caps may witness faster growth pick-up on a low base in FY19 (and from bombed-out margins in some cases), but would advise investors to focus on sustainability and not overpay for a riskier business model. Current valuation of mid-cap stocks factors in strong growth over a two to three-year time frame - which we believe is unlikely. Support is likely to be provided by aggressive capital return policies of many companies in the medium term.

### Exhibit 3: Vertical based USD QoQ and YoY growth (%) in 4QFY18

Vertical	Contribution to Revenue (%)	USD growth-QoQ(%)	USD growth-YoY(%)
BFS	26.2	1.5	4.6
Insurance	6.8	1.9	7.7
Manufacturing and Hitech	21.9	2.3	6.9
Retail and CPG	13.3	(3.9)	3.2
Transport and Logistics	2.5	21.3	36.7
Life Sciences	4.7	4.1	11.8
Healthcare	1.9	1.9	3.9
Energy and Utilities	5.9	3.6	29.1
Telecom	10.8	4.8	19.3
Others	6.0	0.2	1.0
<b>Total</b>	<b>100.0</b>	<b>1.9</b>	<b>9.4</b>

Source: Nirmal Bang Institutional Equities Research

### Exhibit 4: Vertical based CC growth (%) in 4QFY18 (QoQ) & FY18 (YoY)

Vertical	4QFY18	4QFY18 CC	FY18	FY18 CC
BFSI	1.1	0.1	7.1	5.9
Manufacturing & Hitech	2.4	1.5	4.2	3.1
Retail & Life Sciences	0.7	(0.7)	3.3	2.0
Energy, Utilities, Communications & Services	3.3	1.8	14.8	12.9

Source: Nirmal Bang Institutional Equities Research

### Exhibit 5: Service Line based USD QoQ and YoY growth (%) in 4QFY18

Services	Contribution to Revenue (%)	USD growth-QoQ(%)	USD growth-YoY(%)
Application Development	15.5	2.5	10.8
Application Maintenance	15.6	(1.9)	1.6
Infrastructure Management Services	9.3	7.6	19.7
Testing Services	9.8	6.2	19.1
Business Process Management	5.4	3.8	15.8
Product Engineering Services	4.0	1.9	9.4
Others	3.1	12.8	6.0
Consulting, Package Implementation & Others	32.4	0.6	8.7
Products, Platforms and Solutions	4.9	(5.8)	(2.6)
<b>Total</b>	<b>100.0</b>	<b>1.9</b>	<b>9.4</b>

Source: Nirmal Bang Institutional Equities Research

### Exhibit 6: Geography based CC growth (%) in 4QFY18 (QoQ) & FY18 (YoY)

Geographies	Contribution to Revenue (%)	USD growth-QoQ(%)	USD growth-YoY(%)
North America	59.4	0.2	4.3
Europe	24.8	3.5	22.7
India	2.8	(4.9)	(4.3)
ROW	13.0	8.5	14.7
<b>Total</b>	<b>100.0</b>	<b>1.9</b>	<b>9.4</b>

Source: Nirmal Bang Institutional Equities Research

### Exhibit 7: Geography based CC QoQ and YoY growth (%) in 4QFY18 & FY18

Geographical segment	4QFY18	4QFY18 CC	FY18	FY18 CC
North America	0.1	0.1	4.5	4.4
Europe	3.6	(0.2)	13.2	8.9
India	(4.8)	(4.9)	6.4	3.3
Rest of World	8.3	6.3	9.9	7.6

Source: Nirmal Bang Institutional Equities Research

## 4QFY18 Concall Highlights

- 4QFY18 broadly in line with expectations:** Infosys' 0.6% CC growth rate in 4QFY18 was slightly below our expectation of 1% CC growth. However, 120bps of CC tailwinds helped it to post 1.8% QoQ growth in USD terms against our estimate of 2.1% in USD terms. While the volume increased 1.1% on QoQ basis, realisation was flattish in CC terms.
- Revenue growth in 4QFY18 driven by ROW, and Energy and Utilities:** As can be seen in Exhibit 3, 5 & 6, growth during the quarter was driven by ROW as a geography (up 8.5% in USD terms on a QoQ basis) and by Telecom, Energy & Utilities and life sciences verticals which were up 4.8%/3.6%/4.1% in USD terms on a QoQ basis, respectively. Testing and Infrastructure services drove revenue growth from a service line perspective.
- Realisation remains stable in FY18:** The management stated that unlike earlier years when realisation was on a declining trend and used to decrease between 1.0% to 1.5% in CC terms, realisation improved 0.2% in CC terms in FY18. We believe this is in positive divergence vis-à-vis numbers reported by TCS as its realisation has been on the decline in the past four quarters (down 0.7%/1.5%/1.5%/0.3% in 4QFY17/1QFY18/2QFY18/3QFY18, respectively).
- Margin performance is better than expected:** 4QFY18 EBIT margin improved 40bps to 24.7% (30bps above our expectation) on QoQ basis on account of: (1) Cross-currency benefits to the tune of 20bps including those coming from cross-currency revenue hedges. (2) Lower onsite contribution (28.7% vs. 29.0%/30.0% in 3QFY18/4QFY17, respectively). These gains (about 90bps) were partially offset by the drop in employee utilisation & price realisation (20bps) and higher variable pay (30bps). The management indicated peaking out of easy levers such as employee utilisation, but reiterated its focus to reduce onsite employee costs by looking hard at billing rates to improve productivity of its senior onsite employees in fixed-price projects, and indicated automation to be a margin improvement lever going forward.
- New client addition was strong:** Infosys added 1/1/4/5/4 clients in US\$75mn/US\$50mn/US\$25mn/US\$5mn/US\$1mn+ categories, respectively on a QoQ basis.
- Automation benefits show up in numbers:** Infosys stated that it is trying to negate pricing pressure by increasing automation in its operations and bringing in productivity improvement. Its AI platform 'Nia' is being used for large-scale transformation within AMS and testing, as well as to drive cost savings in managed services projects. Also, net employee addition significantly reduced from 6,320 in FY17 to 3,743 in FY18 which resulted in improvement in revenue per employee to US\$54,600 in 4QFY18 from US\$53,700 in 3QFY18. Infosys was able to improve its utilisation including trainees as well as excluding trainees from 78.2%/82.0% in 4QFY17 to 80.8%/84.7%, respectively, in 4QFY18. We believe that utilisation has now peaked out as a margin lever and it will be difficult to extract more benefits from it.
- New services, product and platform sales:** In 4QFY18, new services constituted 11.1% of overall revenues (and grew 14.2% QoQ in USD terms) and new software constituted 1.6% of overall revenues. In all, new software and services delivered 12.7% of overall revenues. With ~72% of incremental revenues coming from new software & services, it reflects low growth in the rest 87% of the business. It was indicated that digital now forms >25% of revenues for Infosys and it highlighted that it will be providing more details regarding this service line starting 1QFY19. Earlier, starting 1QFY18, Infosys had segregated revenues from its new services and software launched after 1 April 2015 into two brackets i.e. 'New Services' and 'New Software'. New Services include revenues from its six new segments viz. Cloud Eco-System, Big Data and Analytics, API and Micro Services, Data and Mainframe Modernisation, Cyber Security & IOT Engineering Services, while New Software includes revenues from its platforms such as Edge, Nia, Panaya and Skava. The management seems bullish, particularly on Cloud Eco-system, API and Micro services as well as Cyber Security service lines within New Services.
- Strategy seems to be taking a shift from Products plus Services to Digital Services:** The management indicated that it primarily wishes to showcase itself as a digital services provider, but wishes to keep scaling its products and platforms such as Nia, Finnacle, Edge, Mc Camish which are witnessing strong traction.
- Vertical commentary is the same as in 3QFY18, although a bit muted on BFS:** Just as in 3QFY18, Infosys is banking on Insurance, Energy & Utilities and Telecom to post strong contribution to its revenues in FY19. The commentary on BFS has become a bit more muted with US large banks indicated to be a soft spot going forward. This gels with the commentary of TCS and Cognizant Technology Solutions or

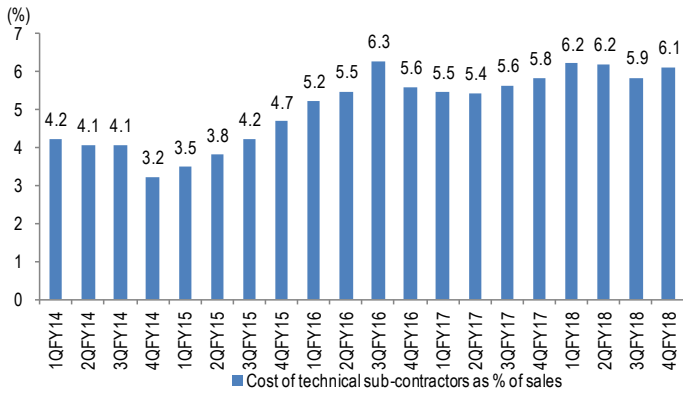


CTS. Infosys stated that the softness is because of insourcing rather than lower spending by these clients. Insourcing is something we had highlighted as sector-related structural problem and not a cyclical one anymore as many Indian providers indicate it to be. However, Infosys continues to state that BFS will do better in FY19 versus FY18 as it sees traction from European banking clients as well as regional banks in the US. This commentary also gels with what we hear from CTS.

- Divergent commentary vis-à-vis TCS in case of Retail vertical:** TCS has indicated double-digit growth expectation for its Retail vertical on increased spending by brick-and-mortar players in the US to improve end-customer experience. Infosys, on the other hand, continued to indicate volatility in its Retail vertical. We believe this is reflective of loss of market share and also the underinvestment in digital capabilities. The recent purchase of user experience design firms like Brilliant Basics and WongDoody are indicative of the efforts of Infosys to close the gap on this front.
- Surprising that Skava and Panaya are being sold off - In 1QFY18 it was indicated that Skava and Panaya were seeing strong momentum:** On conclusion of a strategic review of its portfolio of businesses, Infosys has initiated identification and evaluation of potential buyers for its subsidiaries, Kallidus, Skava and Panaya. This is quite surprising as during the 1FY18 call – nine months ago – the management under then CEO, Dr. Vishal Sikka, had stated that there was strong momentum in the software products space which included products like Skava and Panaya. We are not sure whether it was the basket which was performing well and these were the laggards.
- Impairment being provided for Skava and Panaya.** Following the re-classification of the above mentioned subsidiaries as ‘held for sale’, the management has conducted an impairment test to report them at their fair values on the balance sheet. The impairment test has resulted in Rs5,890mn/ Rs1,180mn (US\$90mn/ US\$18mn) loss on investment value of these subsidiaries on standalone/consolidated basis, respectively. Infosys anticipates completion of the sale by March 2019. The total impairment loss of Rs5,890mn (\$90mn) on investment value of Panaya has been recognised fully in the standalone financials. We, however, believe that the above impairment loss will be recognised in a phased manner over five quarters i.e. Rs1,180mn (US\$18mn) per quarter from 4QFY18 to 4QFY19 in the consolidated financial statements. For existing clients of these subsidiaries, the management stated that it will partner with future buyers of these subsidiaries to keep providing these services to its clients.
- Large deal TCV is not good enough to sustain growth in high single-digit, in our view:** While Infosys’ large deal TCV number improved in 4QFY18 to US\$905mn from US\$779mn in 3QFY18, we believe a much larger number (US\$1.0bn-US\$1.5bn) of large deal wins is required per quarter to drive industry-leading growth. At the current level, that seems unlikely. Infosys also indicated that deal sizes have been reducing in the market, but this is a comment we have heard from its peers too. The management also stated that it has witnessed 10 large deal wins during 4QFY18 and four out of these large deal wins were in the BFSI vertical. **It was indicated that the large deal TCV number for 4QFY18/FY18 largely involved renewals (68%/70%, respectively).** While the refreshed strategy seems to be focused on growing digital revenues, we believe large deal TCV in legacy services will continue to be an important driver of growth in the next 24-36 months. TCV of US\$4.5bn-US\$6bn per year, in our view, is required for a company of Infosys’ size to deliver industry-leading growth.
- Pick-up in discretionary spending may not aid the company as much as it did in the past:** A pick-up in discretionary spending has traditionally helped Infosys, but what constitutes discretionary spending has undergone a change and we do not believe that Infosys has moved with the times adequately. This is reflected with the trouble it had in restructuring and reorienting its consulting business from being a driver of ERP implementation services to one that is focused on digital transformation services. It was indicated that the restructuring of European consulting business is still a work in progress and will take a few more quarters.
- Lower margins are not because of lower project profitability but because of catch-up spending on digital:** One thing that came out clearly is that lowering of the margin band was more because of investments being made by the company to get a greater share of digital revenues rather than because of lower contract profitability. It was indicated that gross margin in digital work is better than traditional work. Our view is that the investments to gain share in digital will be a multi-year one and will lead to lower margins not just in FY19 but beyond that too. We believe the market is being unduly optimistic about margin defence on Infosys. It should also be remembered that the current margin band does not include dilution from acquisitions that the company is likely to make in the digital space – and where the company seems to be far more aggressively poised than before.

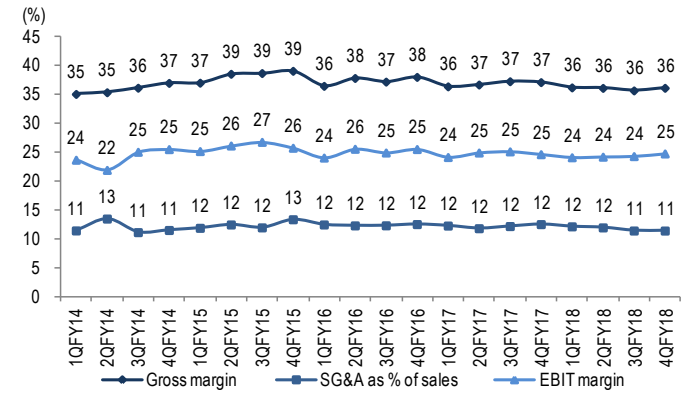
- **Capital allocation:** As per the FY19 capital allocation policy: (1) Infosys will return up to 70% of its free cash flow to its shareholders in a manner to be decided by the board from time to time. (2) Pay an additional up to US\$2bn to its shareholders by way of special dividend of Rs10/share (US\$400mn) in 1QFY19 and rest up to US\$1,600mn in a manner to be decided by the board during the course of FY19. We believe that the most efficient way to distribute wealth to shareholders is through a share buyback which, we believe, can only be initiated in December 2018 following a SEBI regulation which calls for a gap of 12 months between two successive buybacks. In our estimates, we have assumed a buyback effective 4QFY19 which could reduce the share count in FY20 by ~4%.
- **On recently announced plans to hire 10,000 American workers over the next two years:** Infosys stated that it has already established two innovation hubs in Indianapolis and Ralleigh, North Carolina, which can accomodate 2,000 people each. It indicated that another two to three innovation hubs will come up in the next few quarters. Infosys also indicated that it has associated itself with some local Tier1/2 universities and tech communities and it does not see hiring 10,000 local employess as a challenge. The commentary indicates that some of the local hires could be replacements for some of the H1-B and L1 talent which has typically been brought from India.
- **Acquisition:** On 13 April 2018, the company entered into a definitive agreement to acquire WongDoody Holding Company, Inc., an US-based digital creative and consumer insights agency for a total consideration of up to US\$75mn including contingent consideration and retention payouts, subject to regulatory approvals and fulfillment of closing conditions.
- **Wage hike in 1QFY19:** Infosys stated that it will be giving mid to high single-digit wage hike to 85% of its employees (both onsite and offshore) in 1QFY19 and wage hike to rest 15% of the employees will be given in 2QFY19.

**Exhibit 8: Sub-contractor charges pick up again in 4QFY18 after declining in 3QFY18**



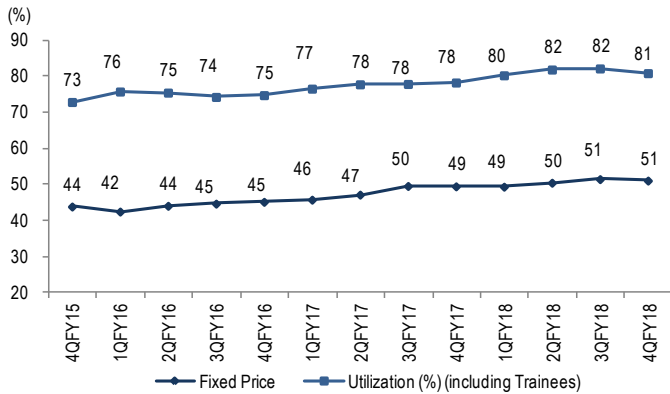
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 9: Margins improve on better revenue mix and cross-currency hedges in 4QFY18**



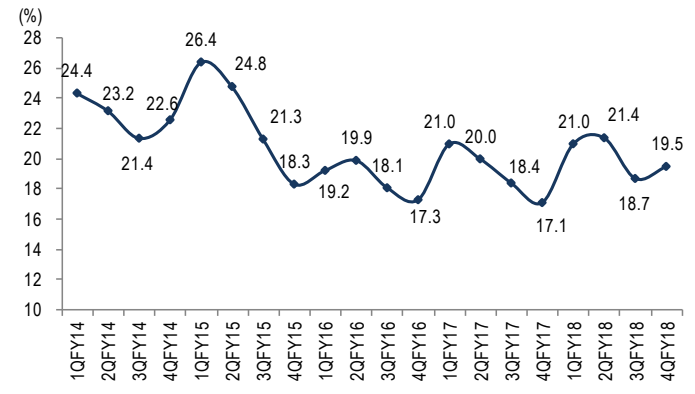
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 10: FP contracts are a key lever left for improvement in margins, as employee utilisation has almost peaked out**



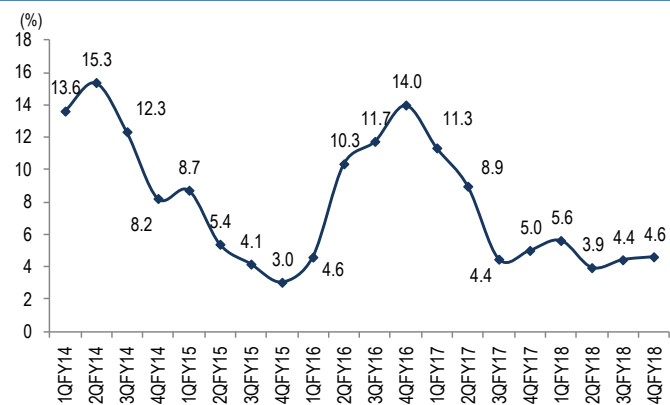
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 11: Attrition rate has started to rise again**



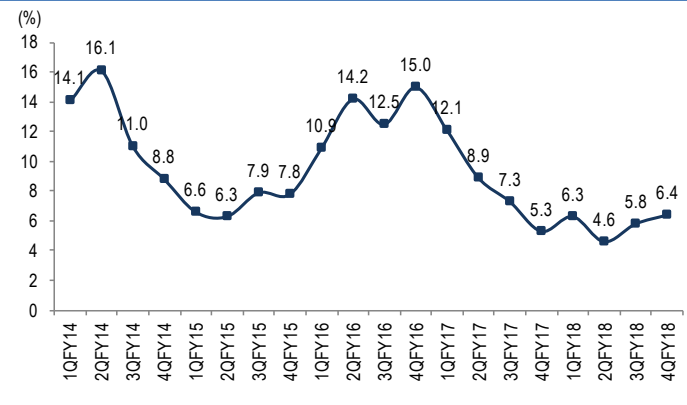
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 12: BFSI YoY growth in USD terms has picked up a bit**



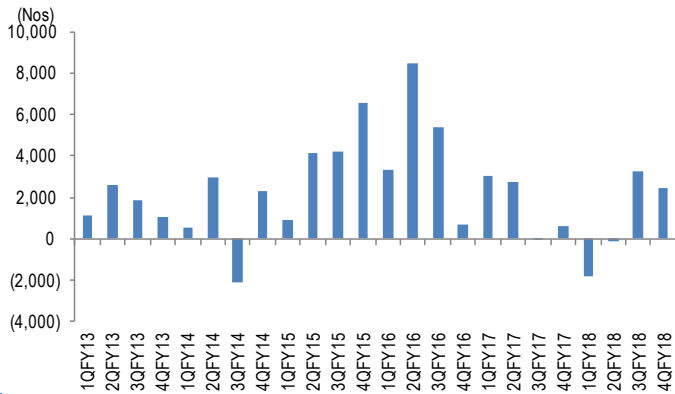
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 13: YoY revenue growth (CC terms) moves up in 4QFY18**



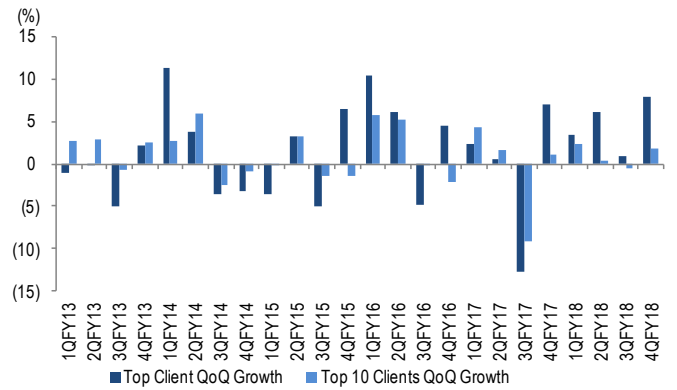
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 14: Effect of automation and focus on utilisation is being seen in lower net employee addition in FY18 vs. FY17**



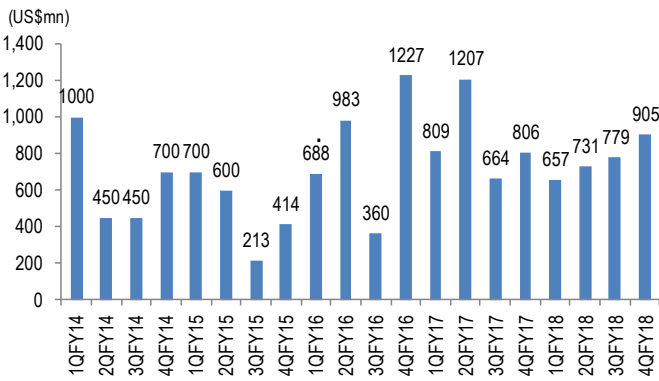
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 15: Top accounts' growth recovers after seasonal weakness in 3QFY18**



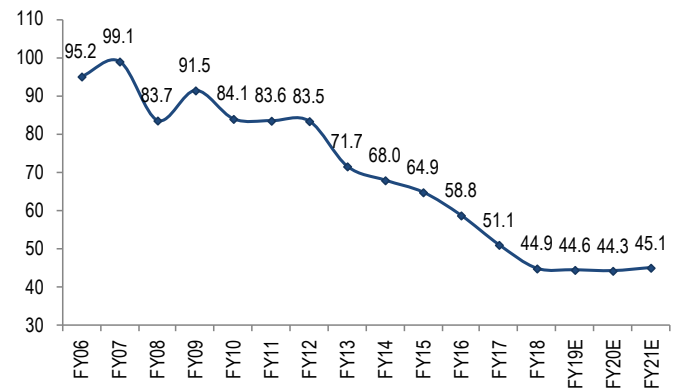
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 16: Total deal TCV increases, but a major part of it is renewals**



Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 17: RoIC (%) has been falling rapidly**



Source: Company, Nirmal Bang Institutional Equities Research



**Exhibit 18: Quarterly snapshot**

Year to 31 March (Rsmn)	3QFY16	4QFY16	1QFY17	2QFY17	3QFY17	4QFY17	1QFY18	2QFY18	3QFY18	4QFY18
INR/USD	66.1	67.7	67.1	66.9	67.7	66.7	64.4	64.4	64.6	64.4
<b>USD Revenue (USD mn)</b>	<b>2,408</b>	<b>2,444</b>	<b>2,502</b>	<b>2,587</b>	<b>2,551</b>	<b>2,566</b>	<b>2,651</b>	<b>2,728</b>	<b>2,755</b>	<b>2,806</b>
INR Revenue	159,020	165,500	167,820	173,100	172,730	171,200	170,780	175,670	177,940	180,830
Gross margin	59,120	62,880	61,010	63,480	64,330	63,500	61,780	63,400	63,440	65,290
SGA	19,530	20,680	20,540	20,390	20,990	21,380	20,670	20,940	20,250	20,570
EBIT	39,590	42,200	40,470	43,090	43,340	42,120	41,110	42,460	43,190	44,720
Other income	8,020	7,710	7,510	7,600	8,200	7,210	7,430	8,830	9,620	6,520
PBT	47,610	49,910	47,980	50,690	51,540	49,330	48,540	51,290	52,810	51,240
Tax	12,960	13,940	13,620	14,600	14,460	13,300	13,710	14,030	1,520	13,470
PAT-Adjusted	34,650	35,970	34,360	36,090	37,080	36,030	34,830	37,260	51,290	37,770
Shares Outstanding (Basic)	2,297	2,297	2,297	2,297	2,297	2,297	2,297	2,297	2,275	2,173
EPS Adjusted (Rs)	15.1	15.7	15.0	15.7	16.1	15.7	15.2	16.2	16.3	17.4
<b>YoY growth (%)</b>										
<b>USD revenues</b>	<b>8.5</b>	<b>13.1</b>	<b>10.9</b>	<b>8.1</b>	<b>6.0</b>	<b>5.0</b>	<b>6.0</b>	<b>5.5</b>	<b>8.0</b>	<b>9.4</b>
INR revenues	15.3	23.4	16.9	10.7	8.6	3.4	1.8	1.5	3.0	5.6
Gross profit	10.8	20.1	16.6	7.4	8.8	1.0	1.3	(0.1)	(1.4)	2.8
EBIT	7.3	22.4	17.4	7.9	9.5	(0.2)	1.6	(1.5)	(0.3)	6.2
Net profit	6.6	16.1	13.4	6.2	7.0	0.2	1.4	3.2	38.3	4.8
<b>QoQ growth (%)</b>										
<b>USD revenues</b>	<b>0.6</b>	<b>1.5</b>	<b>2.4</b>	<b>3.4</b>	<b>(1.4)</b>	<b>0.6</b>	<b>3.3</b>	<b>2.9</b>	<b>1.0</b>	<b>1.9</b>
INR revenues	1.7	4.1	1.4	3.1	(0.2)	(0.9)	(0.2)	2.9	1.3	1.6
EBIT	(0.9)	6.6	(4.1)	6.5	0.6	(2.8)	(2.4)	3.3	1.7	3.5
Net profit	2.0	3.8	(4.5)	5.0	2.7	(2.8)	(3.3)	7.0	37.7	2.2
<b>Margins (%)</b>										
Gross margin	37.2	38.0	36.4	36.7	37.2	37.1	36.2	36.1	35.7	36.1
EBIT	24.9	25.5	24.1	24.9	25.1	24.6	24.1	24.2	24.3	24.7
PAT	21.8	21.7	20.5	20.8	21.5	21.0	20.4	21.2	28.8	20.9
SG&A	12.3	12.5	12.2	11.8	12.2	12.5	12.1	11.9	11.4	11.4

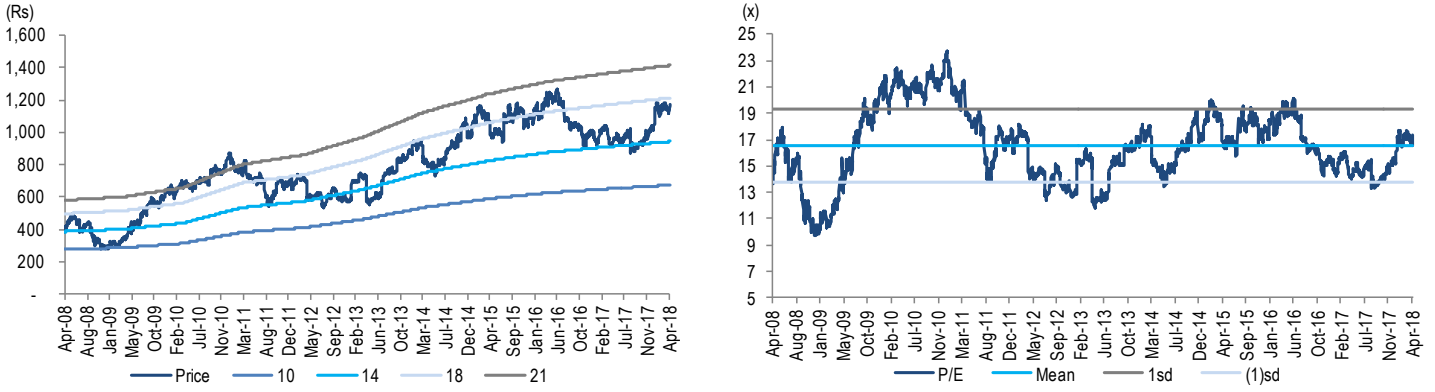
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 19: Key metrics**

Key metrics	1QFY16	2QFY16	3QFY16	4QFY16	1QFY17	2QFY17	3QFY17	4QFY17	1QFY18	2QFY18	3QFY18	4QFY18
<b>P and L (Rsmn)</b>												
Revenues	143,540	156,350	159,020	165,500	167,820	173,100	172,730	171,200	170,780	175,670	177,940	180,830
EBITDA	34,470	39,930	39,590	42,200	40,470	43,090	43,340	42,120	41,110	42,460	43,190	44,720
PAT	30,300	33,980	34,650	35,970	34,360	36,090	37,080	36,030	34,830	37,260	51,290	37,770
<b>Vertical mix (%)</b>												
Manufacturing	24.0	23.8	22.8	22.7	22.8	22.5	22.5	22.4	22.2	22.0	21.8	21.9
Insurance Finance and Banking	33.1	32.8	33.5	32.8	32.8	33.1	33.3	33.5	33.3	33.4	33.1	33.0
Telecom	8.4	7.9	8.0	8.6	9.4	9.4	9.1	9.9	10.4	10.4	10.5	10.8
Retailing & CPG	15.0	14.9	14.7	15.0	15.5	14.9	14.6	14.1	14.2	13.8	14.1	13.3
Others (utilities, logistic, transportation, etc)	11.9	12.8	13.3	13.2	12.7	13.4	13.6	13.5	13.3	13.6	14.0	14.4
Life Sciences	5.6	5.9	5.8	5.7	4.7	4.5	4.6	4.6	4.6	4.8	4.6	4.7
Healthcare	2.0	1.9	1.9	2.0	2.1	2.2	2.3	2.0	2.0	2.0	1.9	1.9
<b>Horizontal mix (%)</b>												
Application Development	14.0	14.0	14.1	13.7	14.4	15.6	15.5	15.3	15.4	15.6	15.4	15.5
Application Maintenance, including Y2K	19.9	19.6	19.1	19.7	19.5	18.1	17.0	16.8	16.7	16.0	16.2	15.6
Package implementation	32.8	32.8	33.8	33.2	32.1	32.1	32.4	32.6	32.6	32.5	32.8	32.4
Testing	8.9	9.0	9.2	9.0	9.1	9.2	9.1	9.0	9.3	9.4	9.4	9.8
Product Engineering services	3.5	3.3	3.4	3.4	3.5	3.7	3.9	4.0	4.1	4.1	4.0	4.0
Business Process Management	5.0	4.9	4.9	5.0	4.9	4.9	4.9	5.1	5.0	5.1	5.3	5.4
Infrastructure management	8.3	8.7	7.5	8.0	8.3	8.4	8.6	8.5	8.4	9.0	8.8	9.3
Other services	2.7	2.8	3.0	2.8	2.7	2.9	3.0	3.2	3.1	3.1	2.8	3.1
Products, Platforms and solutions	4.9	4.9	5.0	5.2	5.5	5.1	5.6	5.5	5.4	5.2	5.3	4.9
Products	3.2	2.8	3.0	3.2	3.0	3.0	3.2	3.1	0.0	0.0	0.0	0.0
BPM Platform	1.4	1.0	0.9	1.7	2.1	1.7	1.9	1.9	0.0	0.0	0.0	0.0
Others	0.3	1.1	1.1	0.3	0.4	0.4	0.5	0.5	0.0	0.0	0.0	0.0
<b>Geographic mix (%)</b>												
North America	63.2	63.3	62.5	61.9	62.0	61.5	62.0	62.3	61.1	60.6	60.4	59.4
Europe	22.4	22.9	23.2	23.4	23.0	22.5	22.2	22.1	22.4	23.2	24.4	24.8
India	2.2	2.3	2.8	3.0	2.7	3.4	3.4	3.2	3.6	3.3	3.0	2.8
Rest of the world	12.2	11.5	11.5	11.7	12.3	12.6	12.4	12.4	12.9	12.9	12.2	13.0
<b>Project type</b>												
T&M	58	56	55	55	54	53	51	51	51	50	49	49
Fixed price	42	44	45	45	46	47	50	49	49	50	51	51
Utilisation (%) (including trainees)	76	75	74	75	77	78	78	78	80	82	82	81
Onsite	56.1	56.1	56.5	56.5	57.0	57.0	56.5	56.7	56.6	55.6	54.8	54.6
Offshore	43.9	43.9	43.5	43.5	43.0	43.0	43.5	43.3	43.4	44.4	45.2	45.4
<b>Client concentration (%)</b>												
Top client	3.7	3.7	3.5	3.6	3.6	3.5	3.1	3.3	3.3	3.4	3.4	3.6
Top 5 clients	14.0	14.0	13.9	13.7	13.7	13.1	12.3	12.2	0.0	0.0	0.0	0.0
Top 10 clients	23.0	22.8	22.6	21.8	22.2	21.8	20.1	20.2	20.0	19.5	19.2	19.2
<b>Number of clients</b>												
US\$1mn	535	542	555	558	574	577	591	598	606	620	630	634
US\$5mn	248	258	261	268	268	277	275	282	279	286	290	295
US\$10mn	161	169	171	177	180	186	195	189	190	186	198	198
US\$25mn+	83	85	89	88	87	89	90	91	97	100	101	105
US\$50mn	49	50	51	52	52	54	54	56	56	55	56	57
US\$75mn+	28	31	28	31	31	30	32	31	31	31	34	35
US\$100mn	14	14	13	14	17	18	18	19	18	19	20	20
US\$200mn	6	6	6	6	6	6	6	6	NA	NA	NA	NA
US\$300mn	1	1	1	1	1	1	1	1	NA	NA	NA	NA
Employees	179,523	187,976	193,383	194,044	197,050	199,829	199,763	200,364	198,553	198,440	201,691	204,107
Attrition (consolidated)(%)	19.2	19.9	18.1	17.3	21.0	20.0	18.4	17.1	21.0	21.4	18.7	19.5

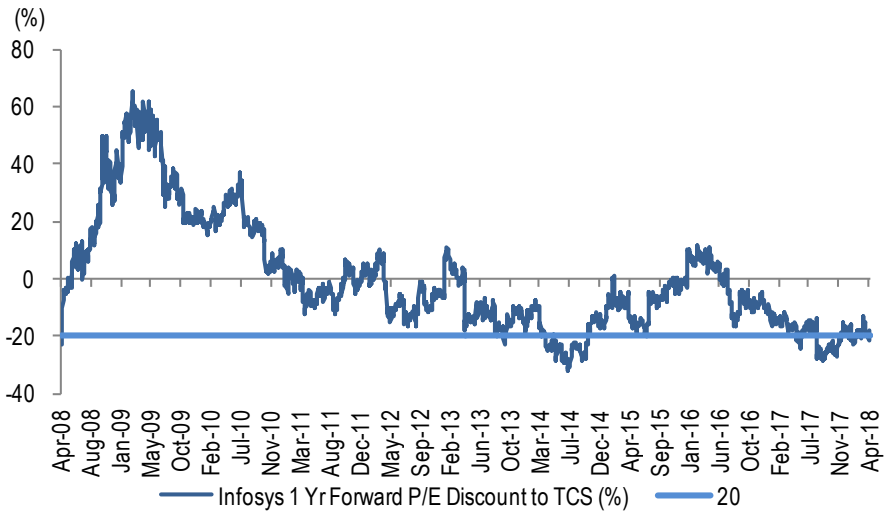
Source: Company, Nirmal Bang Institutional Equities Research

**Exhibit 20: P/E multiple charts**



Source: Company, Bloomberg, Nirmal Bang Institutional Equities Research

**Exhibit 21: Infosys 1 Yr Forward P/E Discount to TCS**



Source: Bloomberg, Nirmal Bang Institutional Equities Research

**Exhibit 22: Comparative Valuation**

	TCS	Infosys	Wipro	HCL Tech	Tech Mahindra	Mindtree	Persistent
Year ending	March	March	March	March	March	March	March
Prices as on 13-April-2018	3,153.3	1,171.5	294.2	991.3	671.6	852.2	688.6
Currency	INR	INR	INR	INR	INR	INR	INR
Market value (Rsbn)	5,858	2,546	1,413	1,380	587	142	55
(US\$m)	90,829	39,471	21,901	21,394	9,102	2,202	854
March 2019 target price	3,155	1,157	302	1,048	608	574	698
Upside/(downside) (%)	0.0	(1.3)	2.6	5.7	(9.4)	(32.7)	1.4
Recommendation	Accumulate	Accumulate	Accumulate	Accumulate	Accumulate	Sell	Sell
<b>FDEPS (Rs)</b>							
FY16	123.2	62.1	18.4	54.2	35.0	35.1	37.2
FY17	133.4	66.0	17.5	60.6	31.6	24.7	37.7
FY18E	135.7	65.0	17.7	62.6	39.1	32.2	42.2
FY19E	150.8	68.8	20.0	66.4	41.6	36.9	48.2
FY20E	154.6	70.9	21.1	68.5	42.6	40.1	48.9
<b>P/E (x)</b>							
FY16	25.6	18.9	16.0	18.3	19.2	24.3	18.5
FY17	23.6	17.7	16.8	16.4	21.2	34.5	18.3
FY18E	23.2	18.0	16.6	15.8	17.2	26.5	16.3
FY19E	20.9	17.0	14.7	14.9	16.1	23.1	14.3
FY20E	20.4	16.5	13.9	14.5	15.8	21.2	14.1
<b>EV/EBITDA (x)</b>							
FY16	18.9	13.0	11.2	14.0	12.9	16.7	12.9
FY17	18.0	12.5	10.9	12.2	12.9	18.6	11.8
FY18E	18.0	12.3	11.7	11.5	11.6	18.2	10.7
FY19E	16.3	12.4	10.1	10.1	10.2	13.1	8.7
FY20E	15.9	11.8	9.2	9.6	9.7	11.8	7.6
<b>EV/Sales (x)</b>							
FY16	5.3	3.6	2.4	3.1	2.1	3.0	2.3
FY17	4.9	3.4	2.2	2.7	1.9	2.6	1.9
FY18E	4.7	3.3	2.3	2.6	1.8	2.5	1.7
FY19E	4.2	3.2	2.0	2.3	1.5	2.1	1.4
FY20E	4.0	3.0	1.8	2.1	1.4	1.9	1.3
<b>RoIC (%)</b>							
FY16	63.1	58.8	32.3	51.3	33.8	40.6	43.5
FY17	60.8	51.1	28.8	46.2	26.2	27.8	31.1
FY18E	57.9	44.9	26.4	38.0	25.9	30.4	30.8
FY19E	60.1	44.6	29.0	34.0	28.1	42.3	37.0
FY20E	59.5	44.3	29.2	30.6	26.8	46.7	38.8

Source: Nirmal Bang Institutional Equities Research

## Financials

### Exhibit 23: Income statement

Y/E March (Rsbn)	FY17	FY18	FY19E	FY20E	FY21E
Average INR/USD	67.1	64.5	66.0	66.1	70.0
<b>Net Sales (USD mn)</b>	<b>10,206</b>	<b>10,941</b>	<b>11,617</b>	<b>12,250</b>	<b>12,224</b>
-Growth (%)	7.4	7.2	6.2	5.4	(0.2)
<b>Net Sales</b>	<b>685</b>	<b>705</b>	<b>767</b>	<b>810</b>	<b>856</b>
-Growth (%)	9.7	3.0	8.7	5.6	5.7
Direct Costs	433	451	495	526	553
Gross Margin	252	254	272	283	303
% of sales	36.8	36.0	35.4	35.0	35.4
SG&A	83	82	94	100	105
% of sales	12.2	11.7	12.3	12.3	12.3
<b>EBIT</b>	<b>169</b>	<b>171</b>	<b>177</b>	<b>184</b>	<b>197</b>
% of sales	<b>24.7</b>	<b>24.3</b>	<b>23.1</b>	<b>22.7</b>	<b>23.1</b>
Other income (net)	31	32	27	19	23
PBT	200	204	205	203	220
-PBT margin (%)	29.1	28.9	26.7	25.1	25.7
Provision for tax	56	57	55	55	59
Effective tax rate (%)	28.1	28.0	27.0	27.0	27.0
<b>Net profit (adjusted)</b>	<b>144</b>	<b>147</b>	<b>150</b>	<b>148</b>	<b>161</b>
-Growth (%)	6.4	2.3	1.8	(1.0)	8.5
-Net profit margin (%)	21.0	20.8	19.5	18.3	18.8
Shares Outstanding (Basic)	2,297	2,173	2,173	2,088	2,088

Source: Company, Nirmal Bang Institutional Equities Research

### Exhibit 25: Balance sheet

Y/E March (Rsbn)	FY17	FY18	FY19E	FY20E	FY21E
Equity capital	11.4	10.9	10.9	10.4	10.4
Reserves & surplus	678	638	546	603	665
Net worth	690	649	557	613	675
Deferred tax liability	2	5	5	5	5
Other liabilities	2	3	3	3	3
Total loans					
<b>Total liabilities</b>	<b>693</b>	<b>658</b>	<b>565</b>	<b>621</b>	<b>683</b>
Goodwill	37	22	22	22	22
Other intangible assets	8	2	2	2	2
Net block	117	121	134	148	164
Investments	164	122	122	122	122
Deferred tax asset - net	5	13	13	13	13
Other non-current assets	65	82	86	91	93
Unbilled revenue	36	43	45	49	50
Derivative financial instrument	3	0	0	0	0
Other current assets	49	64	50	54	55
Income tax assets-current	-	-	-	-	-
Debtors	123	131	140	151	153
Cash & bank balance	226	198	100	130	173
Total current assets	437	436	335	383	430
Total current liabilities	140	141	149	160	163
Net current assets	297	295	186	223	268
<b>Total assets</b>	<b>693</b>	<b>658</b>	<b>565</b>	<b>621</b>	<b>683</b>

Source: Company, Nirmal Bang Institutional Equities Research

### Exhibit 24: Cash flow

Y/E March (Rsbn)	FY17	FY18	FY19E	FY20E	FY21E
EBIT	169	171	177	184	197
(Inc./dec. in working capital)	(19)	(46)	6	(12)	(3)
Cash flow from operations	150	126	184	171	195
Other Income	31	32	27	19	23
Depreciation & Amortisation	17	19	20	21	22
Financial Expenses	0	0	0	0	0
Tax Paid	(56)	(57)	(55)	(55)	(59)
Dividends Paid	(71)	(90)	(122)	(91)	(99)
<b>Net Cash from Operations</b>	<b>71</b>	<b>30</b>	<b>54</b>	<b>66</b>	<b>81</b>
Capital Expenditure	(26)	(3)	(32)	(36)	(38)
Net Cash after Capex	45	27	22	30	43
Inc./(Dec.) in Debt	-	-	-	-	-
(Inc./Dec. in Investments)	(145)	43	0	0	0
Share Issue/(Share Buyback)		(130)	(104)	0	0
Cash from Financial Activities	(145)	(87)	(104)	0	0
Others		32	(16)		
Opening Cash	327	226	198	100	130
Closing Cash	227	198	100	130	173
Change in Cash	(100)	(28)	(98)	30	43

Source: Company, Nirmal Bang Institutional Equities Research

### Exhibit 26: Key ratios

Y/E March	FY17	FY18	FY19E	FY20E	FY21E
<b>Per Share (Rs)</b>					
EPS-Adjusted	62.5	65.0	68.8	70.9	76.9
FDEPS-Adjusted	66.0	65.0	68.8	70.9	76.9
Dividend Per Share	25.8	33.5	46.5	36.2	39.2
Dividend Yield (%)	2.2	2.9	4.0	3.1	3.3
Book Value	300	299	256	294	323
Dividend Payout Ratio (incl DT)	49.6	61.1	81.4	61.5	61.5
<b>Return ratios (%)</b>					
RoE	22.0	21.9	24.8	25.3	24.9
RoCE	30.5	30.5	34.0	34.7	34.2
ROIC	51.1	44.9	44.6	44.3	45.1
<b>Turnover Ratios</b>					
Asset Turnover Ratio	0.8	0.9	1.1	1.0	1.0
Debtor Days (incl. unbilled Rev)	84	89	87	89	85
Working Capital Cycle Days	37	49	40	42	40
<b>Valuation ratios (x)</b>					
PER	17.7	18.0	17.0	16.5	15.2
P/BV	3.9	3.9	4.6	4.0	3.6
EV/EBTDA	12.5	12.3	12.4	11.8	10.8
EV/Sales	3.4	3.3	3.2	3.0	2.8
M-cap/Sales	3.7	3.6	3.3	3.1	3.0

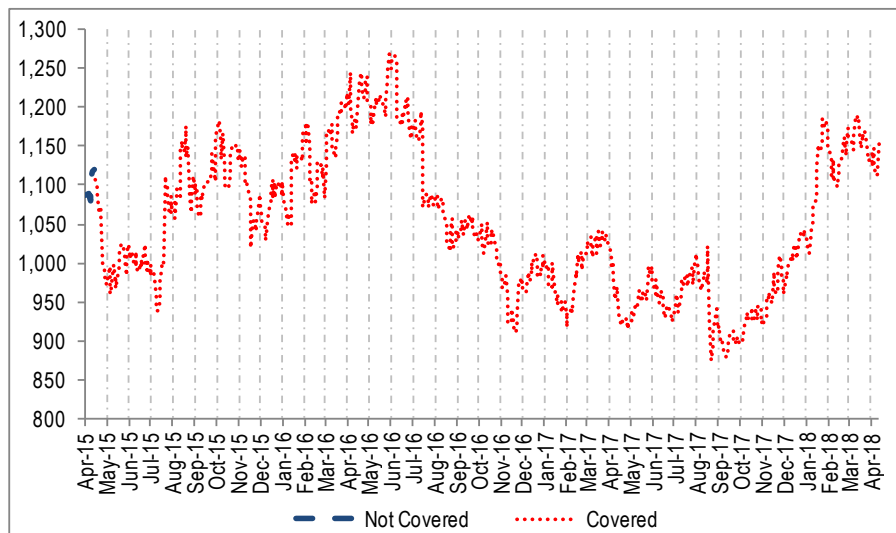
Source: Company, Nirmal Bang Institutional Equities Research

## Rating track

Date	Rating	Market price (Rs)	Target price (Rs)
13 April 2015	Accumulate	2,229	2,147
27 April 2015	Sell	1,995	1,823
4 June 2015	Sell	2,032	1,823
22 July 2015**	Accumulate	1,116	1,189
7 September 2015	Accumulate	1,074	1,189
14 September 2015	Accumulate	1,091	1,189
13 October 2015	Accumulate	1,122	1,194
8 January 2016	Under Review	1,063	-
14 January 2016	Under Review	1,133	-
14 March 2016	Sell	1,141	1,002
15 April 2016	Sell	1,173	1,010
9 June 2016	Sell	1,238	1,010
18 July 2016	Sell	1,072	988
29 August 2016	Sell	1,020	970
17 October 2016	Sell	1,027	964
10 January 2017	Sell	970	920
16 January 2017	Sell	975	910
14 February 2017	Sell	985	926
15 April 2017	Sell	931	887
15 May 2017	Sell	964	887
21 June 2017	Sell	944	844
17 July 2017	Sell	972	846
21 August 2017	Sell	923	794
28 August 2017	Sell	912	836
11 September 2017	Sell	884	836
28 September 2017	Sell	906	833
25 October 2017	Sell	924	873
26 December 2017	Under Review	1,039	-
15 January 2018	Under Review	1,079	-
17 March 2018	Accumulate	1,170	1,154
14 April 2018	Accumulate	1,171	1,157

\*\* Post 1:1 bonus issue of equity shares

## Rating track graph





**DISCLOSURES**

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### Stock Ratings Absolute Returns

BUY > 15%

ACCUMULATE -5% to 15%

SELL < -5%

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