

ANCHOR REPORT

Global Markets Research

11 December 2020



Microfinance – the next decade of opportunity

Long-term opportunity outweighs near-term risk

Microfinance still presents a huge growth opportunity over the next decade and we forecast 18%/16% AUM CAGR over the next 5/10 years. The rural segment, with penetration rates fairly low at c.30%, has the greatest growth potential, in our view, and we estimate 18% AUM CAGR over the next decade. Looking beyond COVID-19, we remain confident that the MFI space will deliver both superior growth and through-cycle profitability. We find CREDAG to be well-positioned to capitalize on this opportunity and initiate coverage with a Buy rating. We also turn positive on small finance banks with better visibility on holdco discounts reducing, and reiterate our positive stance on Bandhan Bank.

Key themes and analysis in this Anchor report include:

- Penetration opportunity and key players' market share trends across geographies.
- Cost efficiency benchmarking across MFI players and their loss-absorption capacity (Covid impact).
- Initiating on CreditAccess Grameen (CREDAG IN) with Buy, and maintain Buy on Bandhan (BANDHAN IN) and Equitas Holdings (EQUITAS IN), and upgrade Ujjivan Financial Services (UJJIVAN IN) to Buy.

India Financials

Amit Nanavati - NFASL
amit.nanavati@nomura.com
+91 22 403 74361

Tanuj Kyal, CFA - NFASL
tanuj.kyal1@nomura.com
+91 22 40374220

India financials

EQUITY: FINANCIALS

Microfinance – the next decade of opportunity

Long-term opportunity outweighs near-term risks;
Initiating on CREDAG at Buy

Action: Initiating on CREDAG at Buy, with 24% implied upside; raise TPs for Bandhan, Equitas and Ujjivan

We see huge opportunity in the MFI space over the next decade despite penetration levels having already improved to 38% (FY20). Specifically, we expect opportunities in the rural market to remain large and forecast 18%/16% AUM CAGRs over the next 5/10 years, with rural segment growing at a faster clip. We think rural-focused NBFC-MFIs are best-placed to capitalize on this opportunity with: 1) a large segment of the MFI players either converting to banks/SFBs (and diversifying away from MFI); 2) the COVID-19 impact further accelerating consolidation among top players, and 3) improving funding environment.

CREDAG – tailored to capitalize on the opportunity

We believe CREDAG is best-positioned to capitalize on the opportunities in the rural market (we estimate 18% five-year CAGR for the industry, within which we expect rural to grow faster at 21%) with: 1) its rural focus (86% of AUMs); 2) strong operational practices; 3) tailor-made approach; and 4) strong parentage aiding a 19% AUM CAGR over FY20-23F. We think CREDAG has been ticking the right boxes with its prudent underwriting and its customer-centric approach. The pandemic remains a near-term concern and resurgent cases in Maharashtra have led to relatively lower collection efficiency for CREDAG (89% in Oct-20). However, we think standard provisions of 3.5% of AUMs, robust PPOP/AUMs of 7% (FY21-23F average), and strong capital position (Tier-1 of 25.6%) should not only aid CREDAG to absorb the COVID-19 impact, but also benefit from the growth opportunity over the medium term. We initiate coverage on CREDAG at Buy with a TP of INR950, implying 24% upside.

Upgrade Ujjivan to Buy; re-iterate our positive stance on Equitas and Bandhan

We upgrade Ujjivan Financial Services to Buy and reiterate our positive stance on Equitas Holdings (Buy) building in a lower holdco discount now, and re-iterate our positive stance on Bandhan Bank (Buy).

Premium valuations to sustain; initiating coverage on CREDAG at Buy

We value CREDAG at INR950 based on the residual income model, implying 2.7x FY23F book multiple and believe its premium valuations are likely to sustain, given: 1) its strong parentage and management; 2) solid pedigree with a proven track record; and 3) robust growth/ earnings delivery. Further, the standard provision buffer of 3.5% of loans and strong PPOP/AUMs and strong capital positioning (Tier 1 of 25.6%) should help CREDAG navigate the current cycle well. We find current valuations at 2.3x FY23F book reasonable in that context and expect ROEs to normalize to 18% by FY23F, with FY20-23F EPS CAGR of 35% despite building in 430/200bp credit costs for FY21/22F.

Key risks: Unsecured book, concentration risks and higher-than-expected COVID-19 stress remain key near-term risks.

Fig. 1: Stocks for action

Stock	Ticker	Rating	M cap (USD mn)	3M ADTV (USDmn)	TP (INR)	Price (INR)	Upside (%)
CREDAG	CREDAG IN	Buy (IC)	1,623	1.3	950	768	23.7%
Bandhan	BANDHAN IN	Buy	8,758	58.7	490	400	22.5%
Equitas	EQUITAS IN	Buy	337	4.7	95	73	30.9%
Ujjivan	UJJIVAN IN	Buy	472	4.8	360	286	26.1%

Note: Priced as at close of markets on 9 December 2020

Source: Bloomberg, Nomura estimates. Initiating coverage on CREDAG

Research Analysts

India Financials

Amit Nanavati - NFASL
amit.nanavati@nomura.com
+91 22 403 74361

Tanuj Kyal, CFA - NFASL
tanuj.kyal1@nomura.com
+91 22 40374220

Fig. 2: Peer valuation comps

Banks	Ticker	Rating	TP	P/B			P/E			ROE			LTP
				FY21F	FY22F	FY23F	FY21F	FY22F	FY23F	FY21F	FY22F	FY23F	
Corporate Banks													
Axis	AXSB IN	Buy	640	1.79	1.60	1.40	23.3	14.4	10.7	8.4%	11.8%	13.9%	635
ICICI	ICICIB IN	Buy	625	1.87	1.68	1.47	18.1	13.5	10.5	11.4%	13.1%	14.9%	511
SBI	SBIN IN	Buy	275	0.65	0.60	0.54	13.5	6.8	5.4	4.9%	9.2%	10.5%	271
BOB	BOB IN	Neutral	50	0.53	0.51	0.47	NM	37.5	8.0	-3.7%	1.2%	5.3%	66
Retail Banks													
HDFCB	HDFCB IN	Buy	1,450	3.87	3.35	2.85	27.5	21.7	17.0	14.9%	16.6%	18.2%	1,406
Kotak	KMB IN	Neutral	1,570	4.71	4.19	3.71	41.0	35.7	30.8	13.0%	12.4%	12.8%	1,885
NBFCs/ HFCs													
HDFC	HDFC IN	Buy	2,425	2.33	2.13	1.94	25.8	20.1	16.8	10.6%	11.6%	12.6%	2,309
MMFSL	MMFS IN	Neutral	130	1.40	1.29	1.17	26.5	12.1	9.5	5.8%	10.8%	12.6%	177
New Banks/ MFIs													
Equitas	EQUITAS IN	Buy	95	1.03	0.93	0.81	12.3	9.5	6.5	9.3%	10.3%	13.4%	73
Bandhan Bank	BANDHAN IN	Buy	490	3.76	3.18	2.68	24.0	15.9	13.6	16.6%	21.7%	21.5%	400
AU SFB	AUBANK IN	Neutral	790	5.78	5.10	4.27	44.6	40.6	24.6	10.4%	13.4%	18.9%	918
Ujjivan	UJJIVAN IN	Buy	360	1.51	1.36	1.19	19.2	12.9	9.1	8.2%	11.1%	13.9%	286
CRE DAG	CRE DAG IN	Buy	950	3.03	2.62	2.20	36.6	19.6	13.7	9.9%	14.3%	17.5%	768

Note: Priced as at close of markets on 9 December 2020

Source: Company data, Nomura estimates

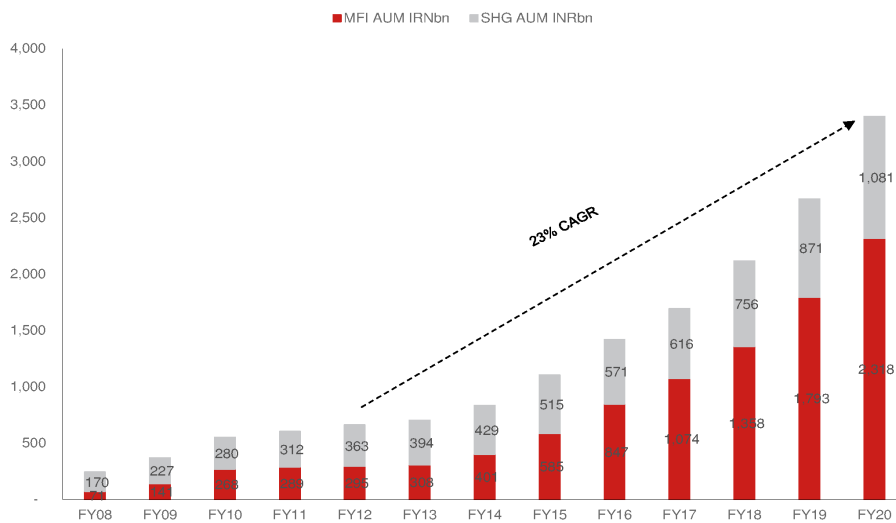
Contents

Microfinance segment is meaningfully large now.....	5
Penetration levels have improved meaningfully – opportunity still large; especially in rural.....	7
Penetration level divergence still exists – few states are getting overheated.....	8
Improving customer vintage has aided ticket size growth.....	10
Opportunity still large – we expect a 16% AUM CAGR for the next decade (18% CAGR over FY20-25F).....	12
Our approach on penetration.....	12
Rural segment presents large opportunity – rural MFIs better positioned.....	13
Individual loans – a large cross-sell opportunity.....	14
Opportunity in every disruption; COVID-19 should further aid consolidation.....	17
SFBs diversifying away from MFIs - opportunity for NBFC-MFIs to gain market share.....	20
Funding constraints getting resolved now.....	22
Opex efficiency – Indian MFIs best-placed globally.....	24
Employee costs have remained stable for NBFC-MFIs.....	26
Overheads – SFBs dragged.....	27
Through-cycle profitability has remained strong.....	32
COVID-19 impact not small, but manageable.....	34
Top players can absorb 13-40% of credit costs (MFI book).....	35
Key risks.....	37
Microfinance remains a high-risk segment.....	37
Lower entry barrier has been another key risk.....	37
COVID-19 pandemic-related impact remains a key near-term risk.....	38
Appendix.....	39
Learnings from the past cycles.....	39
Krishna Crisis 2006.....	39
Karnataka Crisis – 2009/10.....	39
AP Crisis – 2010.....	39
Demonetization - Nov/Dec 2016:.....	41
Kerala Floods – August 2018:.....	44
Cyclone Fani in Orissa – April 2019:.....	44
Assam crisis (link) – Nov/Dec 2019.....	45
CreditAccess Grameen.....	47
Bandhan Bank.....	77
Equitas Holdings.....	81
Ujjivan Financial Services.....	84
Appendix A-1.....	88

Microfinance segment is meaningfully large now

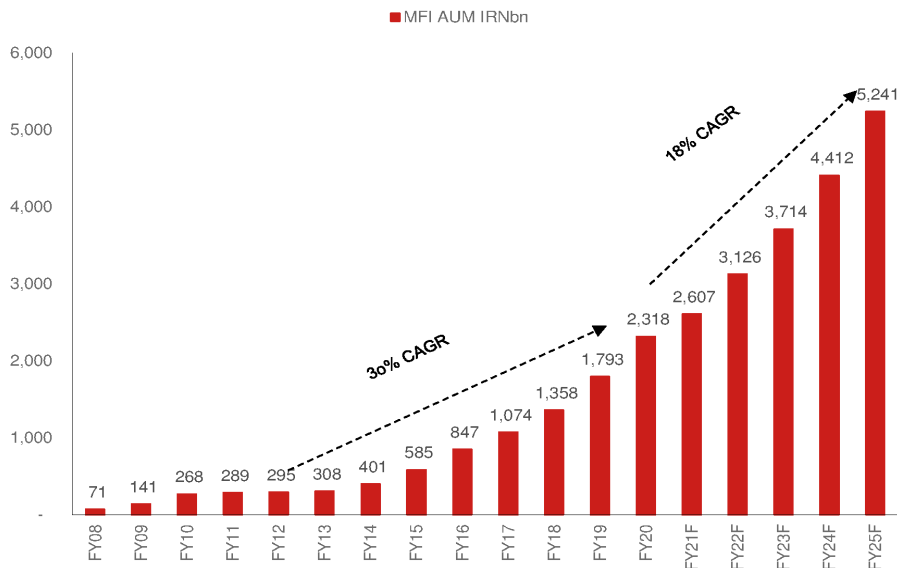
- India's microfinance (MFI) sector has become a meaningfully large segment with INR3.4tn of AUM (including self-help groups [SHG]) as of end-FY20 and has grown at ~23% CAGR over FY12-20. Excluding SHG, growth has been even stronger at ~30% CAGR with an AUM of INR2.3tn for the same period. This makes it one of the largest retail segments after mortgages, as well as the fastest-growing segment with a three-year CAGR of ~30% vs retail loan CAGR of 17% for FY17-20.
- Penetration levels have improved from <18% in FY12 to ~38% of the addressable market as of end-FY20; however, we see a sustainable growth opportunity in this segment with penetration levels likely to improve further, especially in the rural segment. We expect retail loans to provide further growth tailwind as a small portion of borrowers graduate from MFI to retail loans.
- Such strong growth was driven by a 12% CAGR for both ticket sizes, as well as overall unique borrowers reaching ~60mn (>85mn including SHG borrowers, assuming a 50% overlap).
- The industry has consolidated with every past crisis, with AUMs getting more concentrated in the top 6-7 players, which currently account for ~50% of the industry's total AUM (ex-SHGs) vs 40% in FY12. Of the total 105mn MFI accounts (including overlap accounts and excluding SHG), top 7 players account for ~37% of the borrower accounts. We expect the COVID-19 pandemic to further accelerate the consolidation, benefitting the top players in the segment.

Fig. 3: Overall microfinance AUM (incl. SHGs) has recorded 23% CAGR for FY12-20



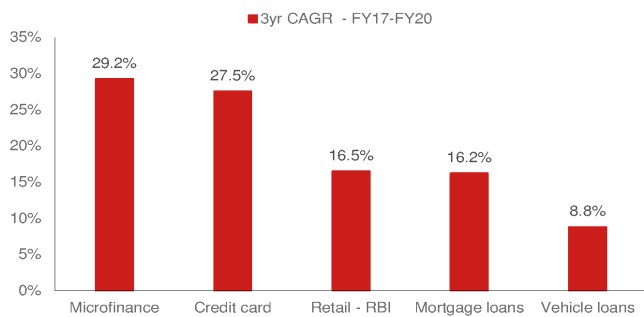
Source: Company data, Nomura research

Fig. 4: Growth has been even faster for MFIs (ex-SHG) at 30% CAGR; we forecast an 18% CAGR for FY20-25F



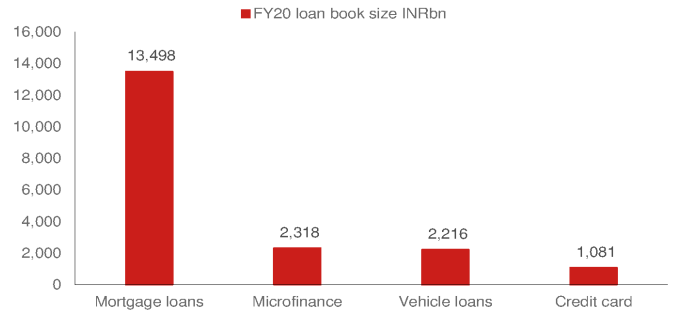
Source: Company data, Nomura estimates

Fig. 5: Microfinance 3-year CAGR at 30% for FY17-20F is the best across all retail categories...



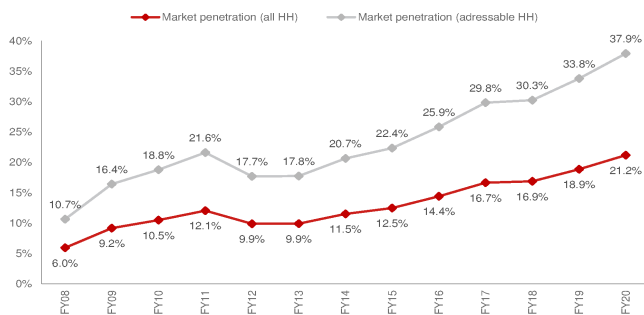
Source: RBI, Nomura research

Fig. 6: ...making MFI the the second-largest retail category after mortgages



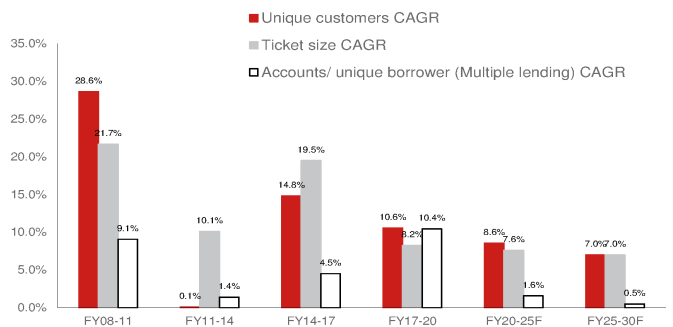
Source: RBI, Nomura research

Fig. 7: We estimate the current penetration level at ~38% of the addressable households in India



Source: Equifax, Nomura estimates

Fig. 8: We expect both ticket sizes and unique customers to grow at 7-8% – leading to total MFI book growth of 18% over FY20-25F



Source: MFIN, Equifax, Nomura estimates

Fig. 9: Past crisis has lead to further consolidation – top-7 players hold 47% market share (by AUM) currently

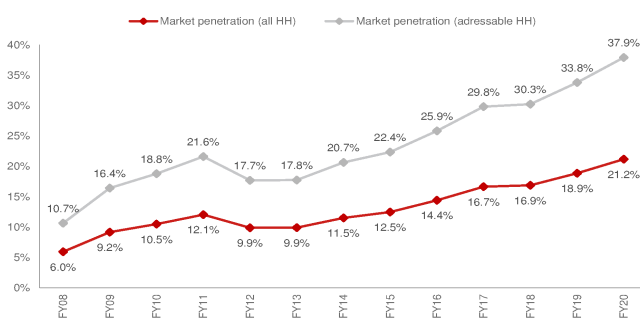
Top Player market share - Disruptions impact	AP crisis impact					Demonetisation impact			FY19	FY20
	FY11	FY12	FY13	FY14	FY15	FY16	FY17	FY18		
Bandhan	8.7%	12.6%	14.4%	15.2%	16.3%	18.2%	19.9%	20.4%	21.5%	19.9%
Equitas	2.7%	2.5%	3.7%	3.7%	3.7%	3.9%	3.1%	1.7%	1.7%	1.6%
Ujjivan	2.2%	2.4%	3.5%	3.8%	5.0%	5.5%	5.0%	4.7%	5.2%	4.6%
SKS/ BHAFIN	14.2%	5.7%	7.7%	7.8%	7.1%	9.1%	8.5%	9.3%	9.7%	10.5%
CREDAI	0.9%	1.4%	1.9%	2.0%	2.5%	3.0%	2.9%	3.7%	4.0%	4.3%
Spandana	12.0%	9.2%	3.8%	2.2%	2.0%	1.4%	1.2%	2.3%	2.4%	2.9%
Madura		0.5%	0.5%	0.6%	0.6%	0.6%	0.8%	0.9%	1.1%	0.9%
Satin		1.1%	1.9%	2.6%	3.7%	3.9%	3.4%	3.2%	3.6%	3.1%
ESAF		1.0%	1.4%	1.5%	1.7%	2.3%	2.5%	2.5%	2.7%	2.7%
Fincare (Disha + Future)		0.8%	0.8%	0.9%	1.1%	1.1%	1.1%	1.3%	1.6%	1.8%
Jana	0.6%	1.2%	3.1%	5.1%	6.4%	13.0%	11.9%	4.3%	3.1%	3.0%
North East				0.3%	0.4%	0.6%	0.6%	0.8%	0.8%	0.6%
Suryoday		0.3%	0.5%	0.8%	1.0%	1.2%	0.8%	1.1%	1.2%	1.2%
Utkarsh		0.3%	0.6%	0.8%	1.2%	1.7%	1.5%	2.0%	2.3%	2.6%
Share		7.1%	3.1%	2.1%	1.1%					
Top 7		34.8%	36.7%	37.3%	40.2%	45.0%	44.0%	45.1%	48.1%	46.9%
All SFBs		8.3%	13.6%	16.9%	20.6%	29.3%	26.6%	18.4%	18.6%	18.1%
Top 3 NBFC-MFIs (incl BHAFIN)		8.1%	11.4%	12.4%	13.3%	15.9%	14.8%	16.1%	17.2%	17.8%

Source: MFIN, Nomura research

Penetration levels have improved meaningfully – opportunity still large; especially in rural

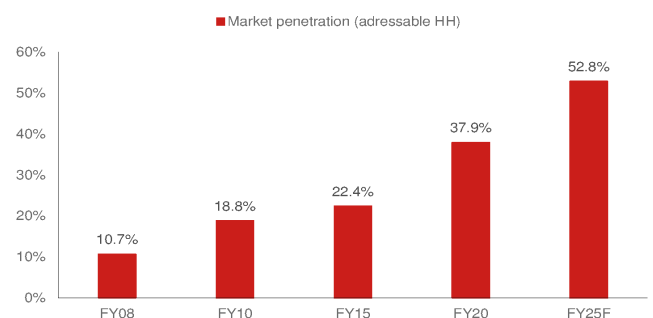
- Penetration levels have improved meaningfully over the past decade with <18% levels as of FY12 improving to ~38% by end-FY20, on our estimate. We forecast penetration levels to improve further to 53% over the next five years.
- Although penetration is not low anymore, we see few pockets of opportunities remain large, especially in rural areas. With ~38% penetration level on a pan-India basis, we estimate the urban market to have reached >50% level while rural remains low at ~30%. Growth in rural areas has outpaced the urban segment, recording 38% CAGR over the past three years vs the urban segment at 24% CAGR for the same period. This trend, in our view, should continue going forward, with lower COVID-19 pandemic-related impact in the rural segment.
- We expect rural segment to continue to drive growth for the sector over the next decade, as cost efficiencies over the past decade and investments in technology/digital initiatives enable a much deeper penetration.
- AUMs currently remain concentrated in top-10 states, which account for >80% of the MFI AUMs – with top-5 states contributing ~55% of the AUMs. States like Tamil Nadu, Karnataka, West Bengal, Assam, Bihar and Odisha seem to be fairly penetrated, with incremental growth of 30-50% CAGR for the past four years and ahead of the industry growth rate.
- That said, we see incrementally lower-penetrated states like Maharashtra, Uttar Pradesh, Madhya Pradesh and other states (below top-10) to drive incremental growth; these states have delivered 35-45% CAGR over the past two years – ahead of the industry CAGR of ~30%.

Fig. 10: We estimate the current penetration level at 38% of the addressable households in India



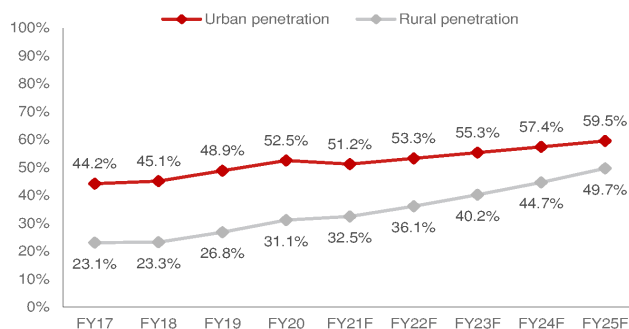
Source: Equifax, Nomura estimates

Fig. 11: We forecast penetration levels of 52-53% by FY25F



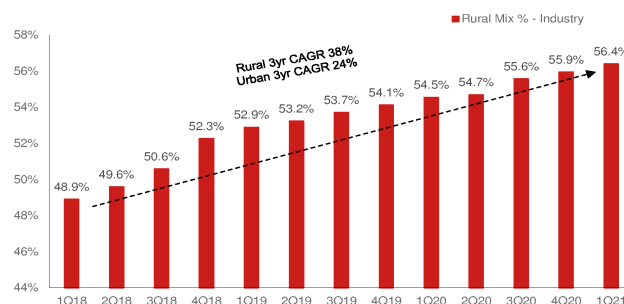
Source: Equifax, Nomura estimates

Fig. 12: Rural vs urban penetration – we estimate much higher penetration in urban at >50% vs ~30% level in rural



Source: CRIF Highmark, Nomura estimates

Fig. 13: Over the past two years – rural segment has grown faster, at 38% CAGR, vs urban at 24%



Source: CRIF Highmark, Nomura research

Fig. 14: Lower-penetrated states like Maharashtra, UP, MP and B-10 states should support growth, in our view

States with portfolio >INR10bn	GLP INRbn					Penetration (incl. SHG)	30+ DPD - 4Q20 - Industry
	FY16	FY18	FY20	4yr CAGR	2 yr CAGR		
Tamil Nadu	110	188	324	30.9%	31.2%	80.3%	1.19%
West Bengal	101	196	309	32.1%	25.5%	52.6%	0.70%
Bihar	53	117	262	49.0%	49.6%	61.4%	0.30%
Karnataka	81	110	190	23.9%	31.3%	65.0%	3.16%
Maharashtra	81	89	164	19.2%	35.5%	28.6%	1.15%
Uttar Pradesh	72	84	152	20.7%	34.4%	19.4%	0.73%
Madhya Pradesh	53	73	133	25.7%	34.8%	45.0%	1.41%
Odisha	37	80	128	36.2%	26.9%	72.3%	1.38%
Assam	38	82	113	31.4%	17.7%	72.8%	13.90%
Kerala	30	58	94	33.3%	27.5%	42.6%	1.28%
Others	125	196	412	34.9%	45.2%	25.3%	1.03%
India	781	1,272	2,281	30.7%	33.9%	56.1%	1.78%
Top 5	427	700	1,248	30.8%	33.5%	60.4%	1.3%
Top 10	657	1,077	1,868	29.9%	31.7%	56.6%	2.5%

Source: MFIN, Nomura research

Penetration level divergence still exists – few states are getting overheated

- We see a sharp increase in penetration in states like Tamil Nadu, Karnataka, Odisha, Assam and Bihar where we incrementally see some signs of overheating.
- Penetration levels in these key states have improved, aided by the higher AUM CAGR of 30-50% for FY16-20 v/s ~30% growth for the industry.
- Increasing competitive intensity in these states is also visible from a relatively sharper increase in the number of MFIs operating there. For example, the number of MFIs operating in Odisha has increased from 10 in FY16 to 27 in FY20, and Assam has seen MFIs rising to 19 currently from 8 in FY16 while Bihar has seen 17 MFIs increasing to 35 over the same period.
- Ticket sizes too have recorded 18-20% CAGR for FY17-20, showing some signs of overheating in these states.
- That said, incremental growth in these states has been slowing down with 20-30% CAGR recorded for FY18-20, while the lesser-penetrated states like Maharashtra, Uttar Pradesh and Madhya Pradesh are growing at a faster pace of ~40% CAGR for FY18-20 as MFIs make inroads into new geographies.

Fig. 15: State-wise penetration levels: Few states like TN, Karnataka, Odisha, Assam and Bihar are showing signs of overheating

States (mn)	Population		Households			MFI		SHG		Total (ex overlap 50%)	Penetration levels %		
	FY19	FY20F	Avg = 5 member	Ex BPL	Adressable 70%	Accounts	Borrowers	Groups	Members		MFI	SHG	Total (ex overlap)
Tamil Nadu	78	79	15.8	14.0	9.8	15.7	7.9	0.4	3.9	9.8	80.3%	39.5%	100.1%
Karnataka	68	69	13.7	10.9	7.6	9.7	4.9	0.7	6.7	8.3	65.0%	87.6%	108.8%
West Bengal	100	101	20.2	16.2	11.3	10.7	6.0	0.8	8.2	10.1	52.6%	72.7%	88.9%
Kerala	36	36	7.3	6.7	4.7	4.5	2.0	0.3	2.9	3.5	42.6%	61.6%	73.3%
Odisha	46	47	9.4	6.3	4.4	6.6	3.2	0.3	3.3	4.8	72.3%	74.7%	109.7%
Maharashtra	123	125	25.0	20.7	14.5	8.2	4.1	0.2	2.3	5.3	28.6%	16.2%	36.7%
Uttar Pradesh	238	242	48.3	34.1	23.9	7.3	4.6	0.2	1.5	5.4	19.4%	6.4%	22.6%
Assam	36	36	7.2	4.9	3.4	4.3	2.5	0.1	1.0	3.0	72.8%	29.4%	87.5%
Bihar	125	127	25.4	16.8	11.8	11.9	7.2	0.7	6.9	10.7	61.4%	58.4%	90.6%
Madhya Pradesh	84	85	17.0	11.6	8.1	6.4	3.7	0.1	1.1	4.2	45.0%	13.0%	51.5%
Others	385	391	78.3	61.8	43.3	19.0	10.9	1.0	10.3	16.1	25.3%	23.8%	37.2%
India	1,371	1,393	278.7	217.6	152.3	104.1	57.1	5.7	56.8	85.5	37.5%	37.3%	56.1%

Source: MFIN, Equifax, Nomura research

Fig. 16: Lesser-penetrated states like Maharashtra, UP, MP and B-10 states should support growth, in our view

States with portfolio >INR10bn	GLP INRbn					Penetration (incl. SHG)	30+ DPD - 4Q20 - Industry
	FY16	FY18	FY20	4yr CAGR	2 yr CAGR		
Tamil Nadu	110	188	324	30.9%	31.2%	80.3%	1.19%
West Bengal	101	196	309	32.1%	25.5%	52.6%	0.70%
Bihar	53	117	262	49.0%	49.6%	61.4%	0.30%
Karnataka	81	110	190	23.9%	31.3%	65.0%	3.16%
Maharashtra	81	89	164	19.2%	35.5%	28.6%	1.15%
Uttar Pradesh	72	84	152	20.7%	34.4%	19.4%	0.73%
Madhya Pradesh	53	73	133	25.7%	34.8%	45.0%	1.41%
Odisha	37	80	128	36.2%	26.9%	72.3%	1.38%
Assam	38	82	113	31.4%	17.7%	72.8%	13.90%
Kerala	30	58	94	33.3%	27.5%	42.6%	1.28%
Others	125	196	412	34.9%	45.2%	25.3%	1.03%
India	781	1,272	2,281	30.7%	33.9%	56.1%	1.78%
Top 5	427	700	1,248	30.8%	33.5%	60.4%	1.3%
Top 10	657	1,077	1,868	29.9%	31.7%	56.6%	2.5%

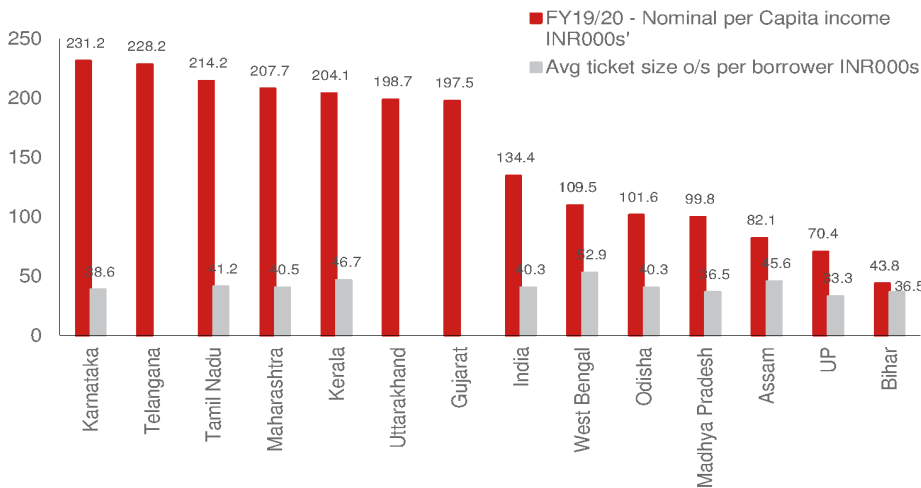
Source: MFIN, Nomura research

Fig. 17: Significant increase in the number of MFIs operating in overheated states

State wise Count of NBFC-MFIs operational	FY12	FY14	FY17	FY20
Assam	7	6	6	19
Bihar	14	17	15	35
Chattisgarh	8	8	16	27
Delhi	8	9	5	4
Gujarat	16	18	11	22
Haryana	10	9	11	21
Jharkand	7	10	12	28
Karnataka	15	18	12	18
Kerala	7	7	7	10
Maharashtra	17	22	24	26
Madhya pradesh	17	21	19	26
Orrisa	11	11	13	27
Punjab	4	5	8	13
Rajasthan	12	14	14	24
Tamil Nadu	24	20	10	18
Uttarakhand	7	10	10	12
Uttar Pradesh	14	15	15	29
West Bengal	11	12	8	23

Source: MFIN, Nomura research

Fig. 18: Average income levels vs average microfinance loan outstanding tickets across states

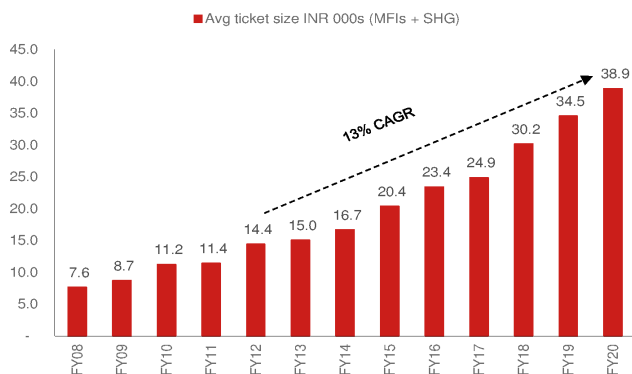


Source: Sa DHAN, Nomura research

Improving customer vintage has aided ticket size growth

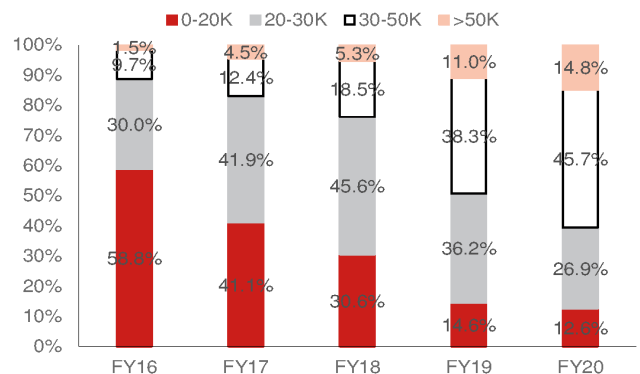
- Aided by better credit information through credit bureaus, increasing regulatory limits on ticket sizes and the improving vintage of borrowers, AUM growth has been aided by the healthy growth in ticket size as well.
- Including SHG, we estimate disbursement ticket sizes for unique borrowers to have seen a 13% CAGR over FY12-20 and evidence of the vintage benefit is also visible from a 16% CAGR in ticket size over FY17-20.
- We estimate overall ticket size per unique borrower to have increased to INR39K, with a similar ticket size for both SHG and MFI (ex-SHG).
- Within top 6-7 players, ticket size growth has been strong at an 18% CAGR over FY12-20, while it has moderated to ~13% CAGR over FY17-20, but excluding Bandhan, ticket sizes are rather similar to industry levels.
- Ticket size for NBFC-MFI players is relatively lower at <20K, but has grown at a similar pace with a 10/14% CAGR over 8 and 3 years, respectively.
- On disbursement basis, ticket size is lower for NBFC-MFI at INR30k vs INR35-40K for Banks/SFBs.
- We see an improvement in the vintage of customers to also play a significant role in increasing the ticket size, with loans disbursed of over INR20k tickets, increasing from ~40% in FY16 to +85% in FY20.
- We expect this trend to continue, especially with just 10-15% of loans disbursed at above the INR50k ticket size currently.
- Further, improving customer vintage aids asset quality which is clearly visible from a better PAR (portfolio at risk) trends for higher vintage customers.

Fig. 19: Ticket sizes have recorded 13% CAGR over FY12-20 (MFI + SHG)



Source: MFIN, Nomura research

Fig. 20: Share of >INR20K disbursement ticket size has increased to +85% in FY20 from 40% in FY16 – partly led by better vintage



Source: Equifax, Nomura research

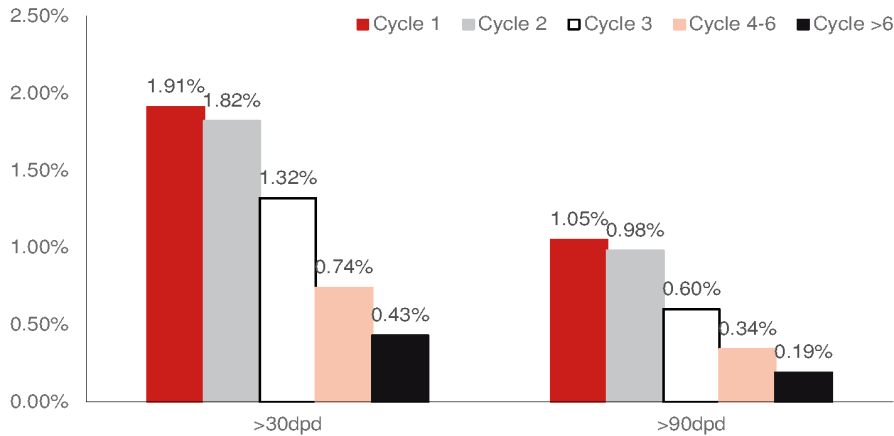
Fig. 21: Ticket sizes – lower for NBFC-MFIs v/s banks/SFBs

Disbursement ticket (INR 000s)	FY16	FY17	FY18	FY19	FY20	CAGR
Banks	17.1	32.5	37.1	41.1	41.4	24.8%
SFBs	19.0	23.5	27.9	32.0	34.6	16.1%
NBFCs MFIs	17.8	17.8	23.2	27.6	30.0	13.9%
NBFCs	19.3	24.1	26.8	31.8	38.2	18.6%

Source: Credit Bureau, Nomura research

Fig. 22: Better vintage customers show better repayment discipline

Cycle wise dpd as of Mar-20



Source: Equifax, Nomura research

Fig. 23: Ticket sizes for top players (ex-Bandhan) similar to industry levels

GLP INRbn	FY12	FY14	FY17	FY18	FY19	FY20	CAGR	
							FY12-20	FY17-20
Bandhan	37	61	214	277	386	462	37.0%	29.3%
BHAFIN	17	31	92	126	174	235	39.2%	37.9%
Ujjivan	7	15	54	63	84	93	38.1%	19.8%
Equitas	7	15	33	23	31	36	22.3%	3.2%
CRETAG	5	8	31	50	72	92	43.0%	44.0%
Satin	3	11	33	43	64	72	47.6%	29.2%
Spandana	27	9	13	32	44	68	12.3%	74.0%
Top 7	104	150	470	613	854	1,058	33.7%	31.1%
Top 7 (ex Bandhan)	66	89	256	336	468	596	31.6%	32.6%
Industry	295	401	1,074	1,358	1,793	2,318	29.4%	29.2%

Borrowers (mn)								
Bandhan	3.6	5.4	6.9	7.7	9.5	11.1	15.1%	17.2%
BHAFIN	4.3	5.0	7.0	7.9	9.1	12.2	14.1%	13.9%
Ujjivan	0.8	1.3	3.6	3.7	4.0	4.4	23.2%	6.8%
Equitas	1.2	1.8	2.5	1.6	2.0	2.1	7.5%	-5.7%
CRETAG	0.3	0.5	1.5	1.9	2.5	2.9	30.4%	24.6%
Satin	0.4	0.8	2.3	2.3	3.2	3.1	30.8%	10.7%
Spandana	3.4	1.2	1.1	1.6	2.5	2.6	-3.6%	32.7%
Top 7	14.0	15.9	24.9	26.7	32.7	38.4	13.4%	15.6%
Top 7 (ex Bandhan)	10.4	10.5	18.0	19.0	23.2	27.3	12.8%	14.9%
Industry	32.1	39.5	62.0	76.6	86.5	105.5	16.0%	19.4%

Average Ticket size (o/s) INR 000's								
Bandhan	10.3	11.3	30.9	35.9	40.7	41.5	19.0%	10.3%
BHAFIN	3.9	6.3	13.1	16.0	19.2	19.2	21.9%	21.1%
Ujjivan	8.6	11.6	15.2	17.0	21.0	21.4	12.1%	12.1%
Equitas	6.1	8.3	13.0	14.0	15.5	17.0	13.7%	9.4%
CRETAG	15.1	16.0	20.5	26.2	28.6	31.6	9.6%	15.5%
Satin	8.9	13.2	14.7	18.5	20.2	23.4	12.9%	16.7%
Spandana	7.9	7.7	11.8	19.8	17.8	26.6	16.5%	31.1%
Top 7	7.4	9.4	18.9	22.9	26.1	27.5	17.9%	13.4%
Top 7 (ex Bandhan)	6.4	8.4	14.2	17.7	20.2	21.9	16.6%	15.4%
Industry	9.2	10.2	17.3	17.7	20.7	22.0	11.5%	8.2%

Source: Company data, Nomura research

Opportunity still large – we expect a 16% AUM CAGR for the next decade (18% CAGR over FY20-25F)

- We still see a large opportunity in the MFI space and expect ~16% CAGR for the next decade (~18% CAGR for FY20-25F), with AUMs expected to increase from INR2.3tn to >INR5tn by FY25F (up 2x from current levels), and further to >INR10tn (4x the current levels) by FY30F.
- We expect growth to be driven by an 8% CAGR for unique borrowers (to ~90mn) by FY25F and ~125mn by FY30F (vs ~60mn unique borrowers currently), and expect ~7% CAGR for ticket sizes over FY20-30F.
- Within that, we expect NBFC-MFIs to continue to grow at a healthy pace with 20%/17% CAGR over the next 5/10 years, gaining market share from 32% currently to 38% by FY30F as SFBs shift their focus incrementally towards retail assets and liability franchise building.
- With this, we expect penetration levels to improve further to >50% by FY25F and >65% by FY30F, from 38% currently.
- We expect rural to present a strong growth opportunity with penetration levels still low at ~30% in FY20, based on our estimates, while the urban penetration opportunity remains low given the high penetration levels – already at >50% in FY20. We expect rural to continue to drive growth for the sector, with an 18% CAGR expectation over FY20-30F vs a 12% CAGR for urban.

Fig. 24: Microfinance industry level projections – we expect MFI AUM of INR5.2tn by FY25F vs INR2.3tn currently (an 18% CAGR)

Microfinance macro estimates	FY08	FY11	FY14	FY17	FY18	FY19	FY20	FY25F	FY30F	CAGR %				
										FY12-20	FY17-20	FY20-25	FY25-30	FY20-30
MFI total INRMn	71,310	2,88,779	4,01,427	10,73,650	13,57,960	17,93,130	23,17,870	52,41,040	1,03,09,918	29.4%	29.2%	17.7%	14.5%	16.1%
Total Accounts (mn)	16.9	38.0	39.5	62.0	76.6	86.5	105.5	165.5	232.1	16.0%	19.4%	9.4%	7.0%	8.2%
Ticket size - Avg O/s	4,223	7,606	10,157	17,327	17,728	20,730	21,970	31,676	44,427	11.5%	8.2%	7.6%	7.0%	7.3%
O/w Rural				5,57,170	6,82,000	10,20,000	12,99,000	33,25,081	70,56,433		32.6%	20.7%	16.2%	18.4%
O/w Urban				4,99,830	6,23,000	8,64,000	10,23,000	19,15,959	32,53,485		27.0%	13.4%	11.2%	12.3%
Mix														
Rural				52.7%	52.3%	54.1%	55.9%	63.4%	68.4%					
Urban				47.3%	47.7%	45.9%	44.1%	36.6%	31.6%					
Unique clients in mn	13.5	28.8	28.8	43.7	45.0	51.8	59.0	89.0	124.9	11.9%	10.6%	8.6%	7.0%	7.8%
Avg. Accounts per client	1.25	1.32	1.37	1.42	1.70	1.67	1.79	1.86	1.86	3.7%	8.0%	0.8%	0.0%	0.4%
SHGs:														
SHG AUM INRMn	1,69,999	3,12,212	4,29,275	6,15,813	7,55,985	8,70,982	10,80,751			14.6%	20.6%			
SHG in mn	3.6	4.8	4.2	4.8	5.0	5.1	5.7							
SHG borrowers (@10ppl per group)	36.3	47.9	42.0	48.5	50.2	50.8	56.8							
Unique borrowers assuming 50% overlap	18.1	23.9	21.0	24.2	25.1	25.4	28.4			3.4%	5.4%			
Total MFI AUM (incl SHGs)	2,41,309	6,00,991	8,30,703	16,89,463	21,13,945	26,64,112	33,98,621			22.8%	26.2%			
Total MFI unique borrowers (incl SHG)	31.6	52.7	49.8	67.9	70.1	77.2	87.4			8.4%	8.8%			
MFI growth drivers														
Total AUM (incl SHGs)		9.5%	18.4%	19.1%	25.1%	26.0%	27.6%							
MFI AUM		7.6%	30.4%	26.7%	26.5%	32.0%	29.3%	18.8%	14.5%					
- o/w Ticket size		-9.4%	8.7%	6.7%	2.3%	16.9%	6.0%	8.0%	7.0%					
- o/w No. of accounts		18.7%	20.0%	18.8%	23.6%	12.9%	22.0%	10.0%	7.0%					
-- w/w Unique client driven			18.2%	17.2%	3.0%	15.1%	14.0%	10.00%	7.00%					
-- w/w Multiple lending driven					20.0%	-1.9%	7.0%	0.0%	0.0%					
Market Share:														
SHGs	70.4%	51.9%	51.7%	36.5%	35.8%	32.7%	31.8%							
MFIs	29.6%	48.1%	48.3%	63.5%	64.2%	67.3%	68.2%							
NBFC MFIs INRMn:	59,540	2,41,115	3,35,170	3,03,490	4,85,220	6,70,090	7,37,920	18,23,882	39,48,699	14.7%	34.5%	19.8%	16.7%	18.3%
Market share	83.5%	83.5%	83.5%	28.3%	35.7%	37.4%	31.8%	34.8%	38.3%					
Total Accounts (mn)	14.1	31.7	33.0	23.3	33.0	38.7	38.4							
Ticket size - Avg O/s	4,223	7,606	10,157	13,025	14,704	17,315	19,217							

Source: Credit Bureaus, Nomura estimates

Our approach on penetration

- On our estimate of 280mn households in India, assuming five individuals per household on average, MFIs have already reached 60mn households, taking the penetration level to 38% (of addressable households).
- Of the 280mn households, we assume ~22% of the households to be below poverty line and hence not addressable. Further, we expect urban addressable households to be 65% and rural at around 75%, leading to an addressable market of 180mn households that MFIs can tap by FY30F.
- Within that, we see a large opportunity for the rural segment, where the penetration levels are lower, at ~30%, and expect this segment to record an 18% CAGR, with the penetration level improving to 70% over the next 10 years; on the other hand, we

expect urban segment to record a relatively slower CAGR of 12%, with the penetration level improving from >50% currently to 65%.

- Further, assuming ~7% CAGR for ticket sizes – aided by both nominal inflation/growth and improving customer vintage, as well as 7-8% growth in unique borrowers, we forecast industry AUMs to record 18%/16% CAGR over the next 5/10 years. This, on our calculation, should improve penetration to >50%/65% by FY25/30F vs. 38% currently.

Fig. 25: We forecast the penetration level to improve to 53% by FY25F vs. 38% currently

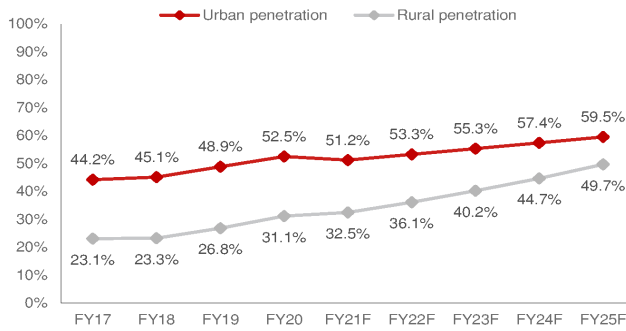
MFI Penetration - India	FY08	FY11	FY14	FY17	FY18	FY19	FY20	FY25F	FY30F	FY12-20	FY17-20	FY20-25	FY25-30	FY20-30
Population (bn)	1,133	1,191	1,250	1,311	1,332	1,371	1,393	1,508	1,633	1.8%	2.1%	1.6%	1.6%	1.6%
Urban	338	367	392	416	425	433	442	488	538	2.0%	2.0%	2.0%	2.0%	2.0%
Rural	796	824	858	895	907	938	952	1,021	1,095	1.7%	2.1%	1.4%	1.4%	1.4%
Households	227	238	250	262	266	274	279	302	327					
- Urban	68	73	78	83	85	87	88	98	108					
- Rural	159	165	172	179	181	188	190	204	219					
Households (excl below poverty line)	177	186	195	205	208	214	218	236	256					
- Urban	58	63	68	72	73	75	76	84	93					
- Rural	118	122	127	133	135	139	141	152	163					
Addressable Households	127	133	140	146	149	153	156	168	182					
- Urban	38	41	44	47	48	49	50	55	60					
- Rural	89	92	96	100	101	105	106	114	122					
Market Penetration (unique clients):														
India (on all HH)	6.0%	12.1%	11.5%	16.7%	16.9%	18.9%	21.2%	29.5%	38.2%					
India (on addressable market)	10.7%	21.6%	20.7%	29.8%	30.3%	33.8%	37.9%	52.8%	68.5%					
- Urban				44.2%	45.1%	48.9%	52.5%	59.5%	65.2%					
- Rural				23.1%	23.3%	26.8%	31.1%	49.7%	70.1%					

Source: Credit Bureaus, Nomura estimates

Rural segment presents large opportunity – rural MFIs better positioned

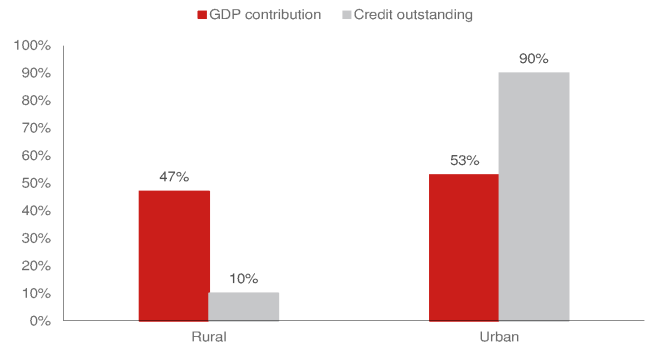
- In our view, higher penetration in urban is a result of lower opex intensity due to high population density, as well as SFBs/banks' attempt to focus on the right mix of asset and liability accretion from their target geographies.
- However, we see a larger growth opportunity for the rural segment given the lower penetration, at ~30%, on our estimate, and expect the rural segment to grow at a much faster pace over the next decade (an 18% CAGR) vs the urban segment, with the penetration level improving from 30% to 65% over FY20-30F.
- This trend is also evidenced from a 38% 3-year CAGR for the rural segment vs the urban segment growing slower, at a 24% CAGR over the same period. Hence, we think rural MFIs are much better positioned to capture this opportunity, and deliver on a faster and a more sustainable growth.
- Within rural players, Bandhan is present in highly-penetrated geographies like Assam, Odisha and West Bengal, and enjoys a dominant market share. Further, given its already elevated ticket size, we expect Bandhan to grow at a slower pace; even as it diversifies into home loans (GRUH portfolio), the growth contribution from microfinance will likely remain relatively low. We expect Bandhan to grow its MFI portfolio (excluding individual loans) at a 16% CAGR over FY20-23F.
- SFBs we cover are more urban-focused, like Equitas and Ujjivan, where we think penetration levels are relatively higher, and hence, we expect 16-17% CAGR for the MFI portfolio over FY20-23F. For these SFBs, we believe the incremental growth will likely come from relatively new segments – we estimate overall AUM CAGR of 18-20% over FY20-23F.
- We forecast AUM growth for CREDAG at 19% CAGR over FY20-23F, and expect it to be the key beneficiary of the rural opportunity.

Fig. 26: Lower rural penetration levels present an opportunity for MFIs



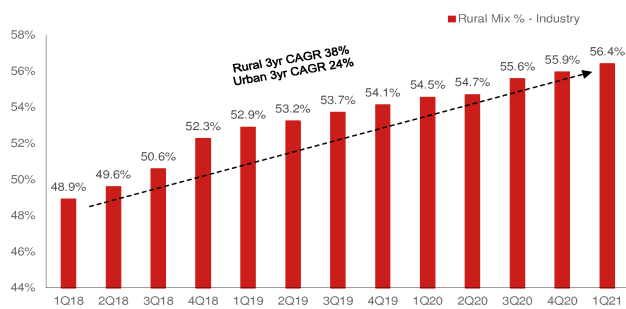
Source: CRIF Highmark, Nomura research

Fig. 27: While rural economy contributes 47% of the country's GDP, credit off-take is just 10% of the system



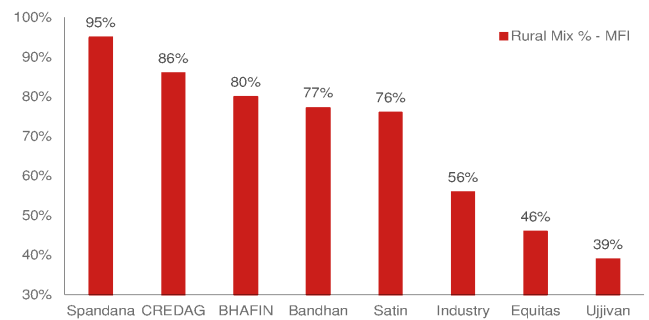
Source: Company data, Nomura research

Fig. 28: Rural MFI has recorded a 38% CAGR over the past 3 years, compared to 24% for urban



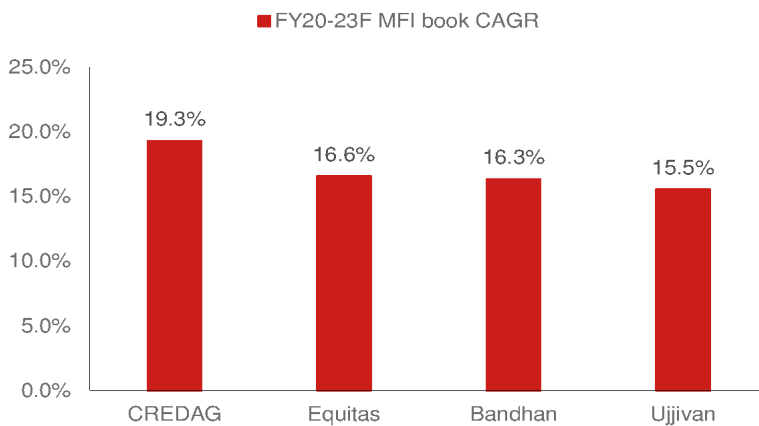
Source: CRIF Highmark, Nomura research

Fig. 29: More rural-focused MFIs like CREDAG, Spandana, BHAFIN to benefit from the opportunity in rural



Source: Company data, Nomura research

Fig. 30: Our growth expectations for top MFI players



Source: Company data, Nomura estimates

Individual loans – a large cross-sell opportunity

- With >65% of customers still in their first/ second MFI loan cycles (50% in first cycle), we see large vintage-related opportunity over the next decade, providing further tailwind to growth.
- As the sector matures and the borrower vintage improves, we see a huge opportunity for cross-selling of retail/individual loans, where MFI borrowers shall over time graduate to individual/retail loan categories.
- This will not only aid growth led by ticket sizes (4-5x of the current MFI loan ticket size), but also benefit through an increase in duration (vs 1-2 year duration of MFI loans), thereby aiding a strong growth opportunity.

- We have seen improving PAR (portfolio at risk) trends with increasing customer vintage (fig 34), which should allow MFIs to graduate higher vintage customers to retail/individual loans over time.
- Assuming 10% of the five-year lagged borrower base potentially graduating to individual loans over the next decade, with ticket sizes at 4-5x of the MFI ticket size, we expect another INR1.5/3tn of opportunity for the system over the next 5/10 years. Further, given the higher duration of these individual loans (>3 years), we expect the AUM growth delta to be even larger.
- Most players have already started taking initial steps in that direction, with top MFIs having 2-13% of micro loans as individual loans (NBFC-MFI retail mix capped at 15% currently by the regulator).

Fig. 31: We estimate the retail lending opportunity at INR1.5-3tn by FY25/30F

Retail lending opportunity	FY20	FY25F	FY30F
Unique borrowers - 5 yr lagged	31.7	59.0	89.0
10% graduating to retail lending	3.2	5.9	8.9
Ticket size @ 4x of MFI ticket size INR		2,53,404	3,55,412
Opportunity size INRbn - Retail		1,496	3,164
% of MFI AUMs		28.5%	30.7%
MFI	2,318	5,241	10,310
MFI + retail lending INRbn		6,737	13,474

Source: Nomura estimates

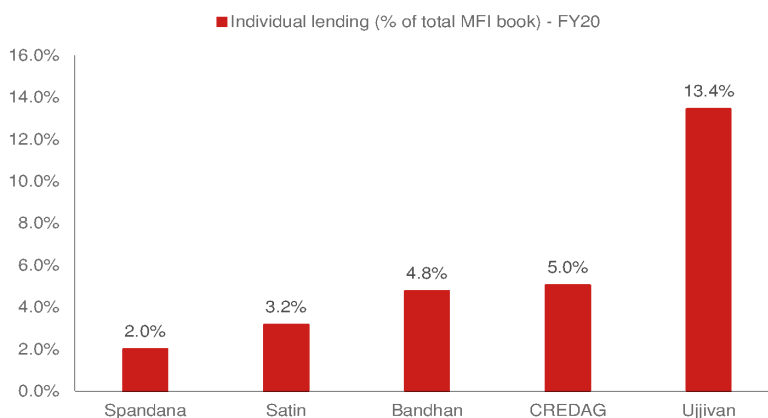
Fig. 32: Higher vintage customers for top players portray a better opportunity to upgrade to retail loans

Customer mix by cycle	Bandhan	BHAFIN	Satin	Spandana	CRETAG	Industry
Cycle 1	22%	38%	44%	22%	26%	54%
Cycle 2 / 3	24%	34%	NA	39%	42%	35%
>= Cycle 4	54%	29%	NA	39%	33%	11%

Note: For CREDAG, we have used borrower vintage by years – <1 year: Cycle 1, 1-3 years: Cycle 2/3, >3years: 4 or more cycles

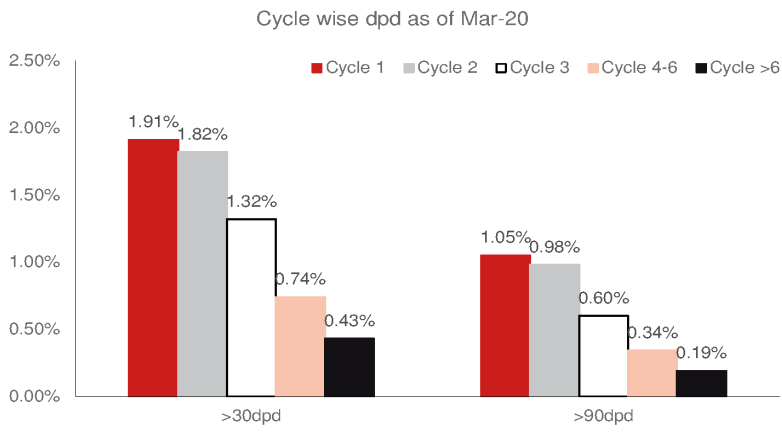
Source: Company data, Nomura research

Fig. 33: Most MFIs currently have just 2-5% of MFI book towards individual lending



Source: Company data, Nomura research

Fig. 34: Better vintage customers are generally more disciplined, providing good opportunity to graduate to individual retail loans



Source: Equifax, Nomura research

Opportunity in every disruption; COVID-19 should further aid consolidation

- Every disruption historically has created market share opportunities, with large market-share shifts towards less-impacted players. Top 7 players account for ~48% of the total industry AUM, recording a 35% CAGR over FY12-20 compared to the industry CAGR of ~30%, with ~400bps market share gains post-demonetization. Further, top-3 NBFC-MFIs have recorded a 47% CAGR, with market share gains of ~400bps for FY17-20, driven by: (1) better access to funding; (2) lesser competition from peers turned SFBs; and (3) relatively lower impact from demonetization.
- Disruptions in the recent past have been rather brutal with large market share losses seen for the impacted MFIs, especially for those with high geographic concentrations. For example, BHAFIN, Spandana and Share commanded total market share of >25% in FY11/12; due to the impact from the TN crisis, their combined market share had reduced to 10% as of end-FY15. Jana and Equitas were amongst the most impacted players during demonetization, having lost market share from 17% in FY16 to <5% in FY19.
- That said, MFI players have recognized the need and have been diversifying their geographic mix, with top-3 states currently accounting for 40-85% for the top players, down from 40-95% three-four years back (fig. 35).
- We think the COVID-19 pandemic should further trigger consolidation to the benefit of larger and relatively less-impacted MFIs.

Fig. 35: Past disruptions have been rather brutal for highly concentrated players; other top players saw significant market-share gains

Top Player market share - Disruptions impact	AP crisis impact					Demonetisation impact			FY19	FY20
	FY11	FY12	FY13	FY14	FY15	FY16	FY17	FY18		
Bandhan	8.7%	12.6%	14.4%	15.2%	16.3%	18.2%	19.9%	20.4%	21.5%	19.9%
Equitas	2.7%	2.5%	3.7%	3.7%	3.7%	3.9%	3.1%	1.7%	1.7%	1.6%
Ujjivan	2.2%	2.4%	3.5%	3.8%	5.0%	5.5%	5.0%	4.7%	5.2%	4.6%
SKS/ BHAFIN	14.2%	5.7%	7.7%	7.8%	7.1%	9.1%	8.5%	9.3%	9.7%	10.5%
CREDAG	0.9%	1.4%	1.9%	2.0%	2.5%	3.0%	2.9%	3.7%	4.0%	4.3%
Spandana	12.0%	9.2%	3.8%	2.2%	2.0%	1.4%	1.2%	2.3%	2.4%	2.9%
Madura		0.5%	0.5%	0.6%	0.6%	0.6%	0.8%	0.9%	1.1%	0.9%
Satin		1.1%	1.9%	2.6%	3.7%	3.9%	3.4%	3.2%	3.6%	3.1%
ESAF		1.0%	1.4%	1.5%	1.7%	2.3%	2.5%	2.5%	2.7%	2.7%
Fincare (Disha + Future)		0.8%	0.8%	0.9%	1.1%	1.1%	1.1%	1.3%	1.6%	1.8%
Jana	0.6%	1.2%	3.1%	5.1%	6.4%	13.0%	11.9%	4.3%	3.1%	3.0%
North East				0.3%	0.4%	0.6%	0.6%	0.8%	0.8%	0.6%
Suryoday		0.3%	0.5%	0.8%	1.0%	1.2%	0.8%	1.1%	1.2%	1.2%
Utkarsh		0.3%	0.6%	0.8%	1.2%	1.7%	1.5%	2.0%	2.3%	2.6%
Share		7.1%	3.1%	2.1%	1.1%					
Top 7		34.8%	36.7%	37.3%	40.2%	45.0%	44.0%	45.1%	48.1%	46.9%
All SFBs		8.3%	13.6%	16.9%	20.6%	29.3%	26.6%	18.4%	18.6%	18.1%
Top 3 NBFC-MFIs (incl BHAFIN)		8.1%	11.4%	12.4%	13.3%	15.9%	14.8%	16.1%	17.2%	17.8%

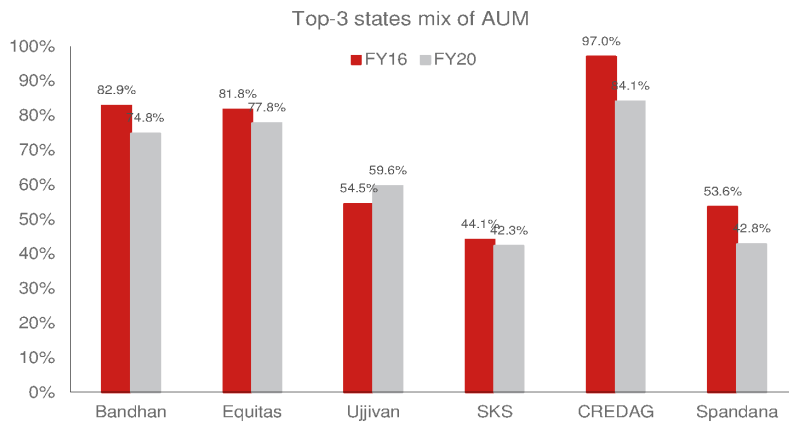
Source: MFIN, Nomura research

Fig. 36: State-wise market-share trends for top players

State wise Market Share %					
Maharashtra	FY16	FY17	FY18	FY19	FY20
Bandhan	4.8%	5.3%	6.0%	6.6%	6.0%
Equitas	5.4%	4.2%	2.5%	2.6%	2.6%
Ujjivan	8.6%	7.0%	7.1%	6.5%	7.2%
BHAFIN	11.6%	10.0%	11.1%	11.3%	12.4%
CRE DAG	9.4%	8.5%	11.9%	12.9%	15.9%
Spandana	2.1%	1.7%	3.8%	3.3%	4.8%
Top players	41.9%	36.8%	42.4%	43.3%	48.9%
Tamil Nadu					
Bandhan	0.8%	0.8%	1.0%	1.0%	1.1%
Ujjivan	6.3%	5.5%	5.6%	6.9%	6.8%
CRE DAG	0.8%	1.1%	1.7%	2.7%	7.2%
Top players	24.4%	19.1%	14.5%	16.9%	21.0%
Karnataka					
Bandhan	1.9%	2.1%	2.0%	2.0%	2.3%
Equitas	2.8%	2.3%	1.3%	1.9%	1.9%
Ujjivan	11.6%	9.3%	8.2%	8.7%	11.1%
BHAFIN	13.5%	10.7%	10.9%	12.0%	14.0%
CRE DAG	19.8%	17.5%	22.2%	22.9%	24.6%
Spandana	2.9%	2.2%	5.5%	3.6%	4.4%
Top players	52.6%	44.1%	50.1%	51.1%	58.4%
West Bengal					
Bandhan	80.2%	77.7%	74.2%	67.9%	64.7%
Ujjivan	8.4%	6.4%	5.4%	5.7%	6.2%
BHAFIN	7.3%	7.9%	8.2%	8.1%	9.6%
Top players	95.9%	92.1%	87.8%	81.7%	80.5%
Bihar					
Bandhan	30.0%	27.9%	26.0%	22.6%	24.1%
Ujjivan	5.0%	3.7%	3.3%	3.7%	3.4%
BHAFIN	16.1%	17.2%	15.7%	14.1%	13.8%
Top players	51.1%	48.8%	45.0%	40.4%	41.3%
Uttar Pradesh					
Bandhan	8.3%	10.2%	10.8%	14.1%	15.1%
Ujjivan	4.1%	3.2%	2.6%	2.4%	3.4%
BHAFIN	10.1%	7.6%	9.8%	13.1%	14.4%
Top players	22.5%	21.0%	23.2%	29.6%	32.8%
Odisha					
Bandhan	9.3%	8.8%	10.1%	13.5%	13.3%
Ujjivan	3.4%	2.7%	2.5%	3.4%	2.6%
BHAFIN	30.1%	25.1%	24.3%	23.1%	25.5%
Spandana	5.4%	4.4%	7.0%	7.9%	8.5%
Top players	48.3%	40.9%	43.9%	48.0%	49.9%
Assam					
Bandhan	80.3%	76.3%	66.4%	55.6%	60.4%
Ujjivan	5.3%	4.6%	4.1%	4.1%	3.4%
Top players	85.6%	80.9%	70.4%	59.6%	63.7%
Rest of India					
Bandhan	3.9%	5.0%	6.1%	10.5%	9.1%
Equitas	2.4%	2.5%	1.5%	1.6%	1.3%
Ujjivan	2.1%	3.2%	3.2%	4.2%	1.4%
SKS	7.8%	8.1%	10.2%	12.3%	11.0%
CRE DAG	0.3%	0.7%	1.2%	2.0%	-0.3%
Spandana	2.2%	2.2%	4.2%	6.2%	6.4%
Top players	18.7%	21.7%	26.5%	36.8%	28.9%

Source: Company data, Nomura estimates

Fig. 37: Top players have recognized the need to diversify geographically, and have reduced exposure to respective top-3 states

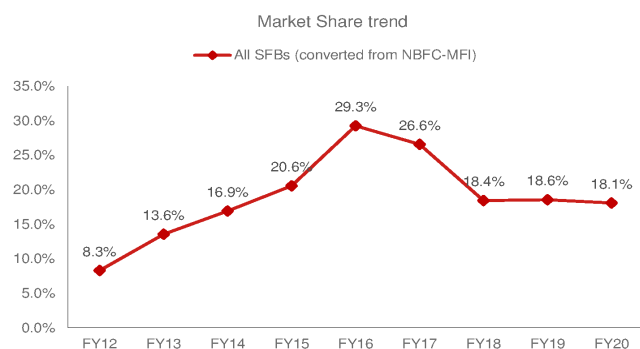


Source: Company data, Nomura research

SFBs diversifying away from MFIs - opportunity for NBFC-MFIs to gain market share

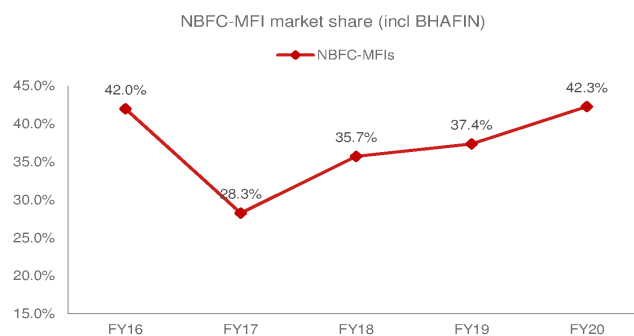
- Over the past five years, the MFI space has seen 9-10 larger players either converting into SFBs or banks, with Bandhan having converted into a bank in FY16 (BHAFIN acquired by IndusInd Bank in early-FY20) and 7-8 MFIs having converted into SFBs over FY15-16. These players accounted for 46% of the total market share with AUMs of INR1.1tn as of end-FY20, and grew at a faster pace over FY12-17 relative to the industry, with a combined AUM CAGR of 48%.
- Incrementally, as these players were converted into banks, they have been focusing on diversifying their asset base; demonetization impact along with branch banking-related drags severely impacted momentum for them. Bandhan, too, is largely present in highly-penetrated states like West Bengal and Assam, and already disburses higher ticket size loans vs the industry (better vintage customers), with currently lesser penetration opportunity, in our view.
- These MFI players (converted to banks) have recorded market share losses since FY17, with total SFB market share falling from 29% in FY16 to ~18% in FY20; we note that Bandhan has also not seen any market share gains during this period. This has led to market share gains for NBFC-MFIs from 28% in FY17 to 42% in FY20 (including BHAFIN). We expect this trend to continue as MFIs turned into banks, focusing on building a liability franchise and diversify their asset base.
- Looking at state-wise market share trends, we note a similar pattern with MFI-turned-banks losing market shares or at least the top NBFC-MFIs gaining market share at a faster pace in most key states, including Maharashtra, UP, Karnataka, Odisha and B-10 states.
- We expect NBFC-MFIs to gain >50bps market share annually over the next decade, and account for ~38% of the total industry AUM by FY30F vs ~32% currently. That said, we acknowledge that larger NBFC-MFIs will eventually have to convert into banks as they grow larger in size.

Fig. 38: SFBs have lost quite some market share as they shift focus towards retail lending and deposit accretion



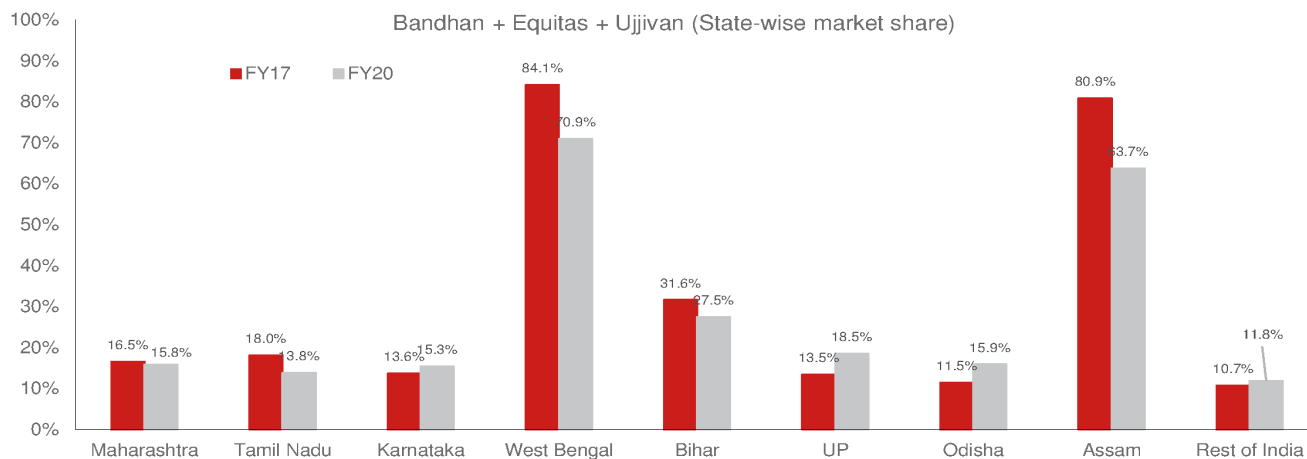
Source: MFIN, Nomura research

Fig. 39: NBFC-MFI market share has improved with large players shifting focus as they became SFBs



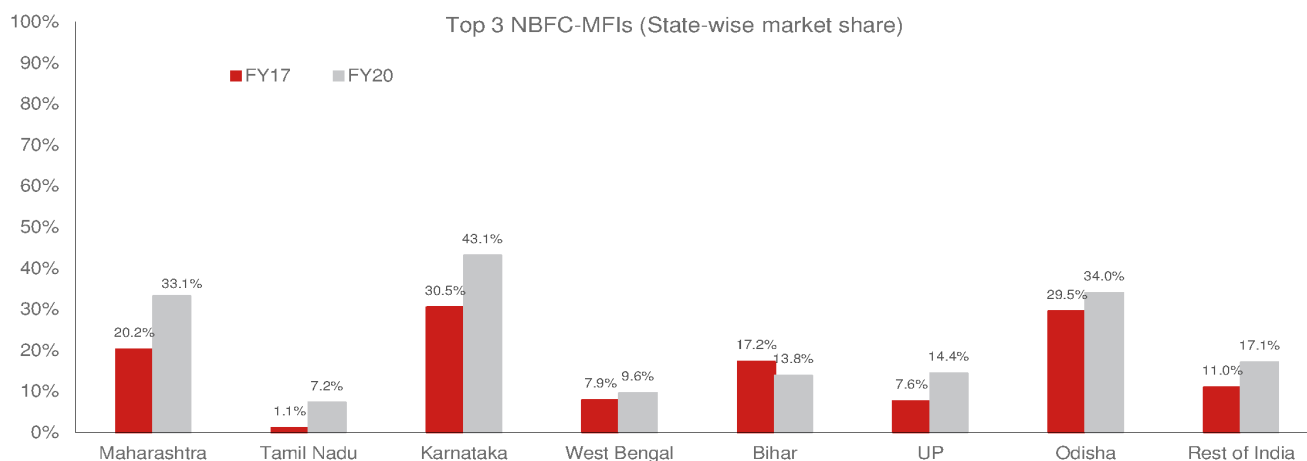
Source: MFIN, Nomura research

Fig. 40: Banks and SFBs (converted from NBFC-MFIs) have lost market share across states as well



Source: Company data, Nomura estimates

Fig. 41: NBFC-MFIs have capitalized by gaining market share over the same period across most states

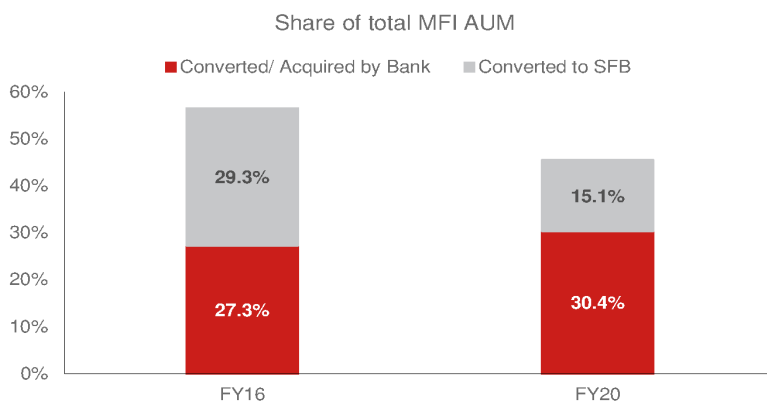


Note: Tamil Nadu data for FY20 also includes the impact of Madura's merger with CAGL (5% market share)
 Source: Company data, Nomura estimates

Funding constraints getting resolved now

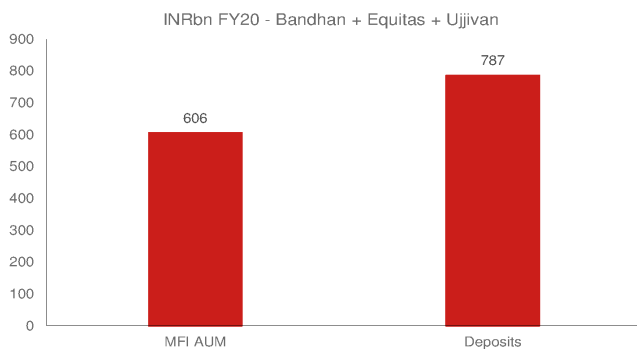
- With 40-45% of the industry converting into banks/SFBs over the past 4-5 years, we see a fair amount of funding stability coming into the sector. These MFIs turned into banks/SFBs account for INR1.1tn of the total AUM (INR810bn excluding BHAFIN) as of end-FY20, against which they have built up a deposit base of INR1.1tn (excluding BHAFIN).
- More importantly, incremental growth has largely been funded by deposits, with INR204bn of deposit accretion for Equitas + Ujjivan, vs. INR160bn of AUM accretion over FY17-20 and INR57bn of AUM accretion in the MFI segment.
- We see this as a clear game-changer for the industry given funding shocks will likely get meaningfully minimized in the sector; moreover, as liabilities build up for SFBs, capital availability should meaningfully ease out for NBFC-MFIs.
- That said, we believe that NBFC-MFIs will eventually have to convert into banks/SFBs as they gain size and scale.

Fig. 42: Most of the top players (~45% of the market share) have converted into banks/SFBs – leading to more funding stability for the sector



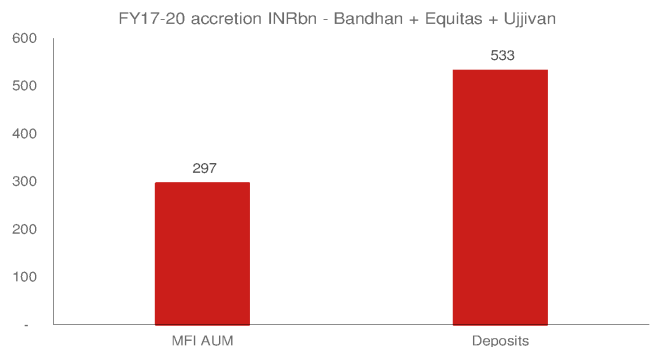
Source: Company data, Nomura research

Fig. 43: Deposits vs MFI AUM for top large banks/SFBs (converted from NBFC-MFIs)



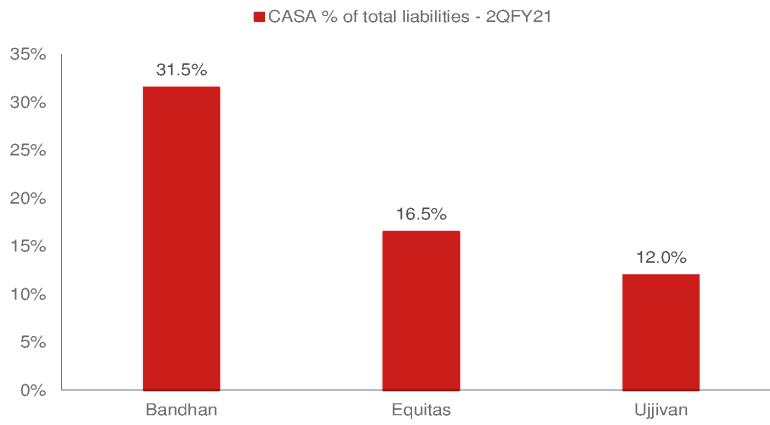
Source: Company data, Nomura research

Fig. 44: Deposit accretion has been quite strong and has aided loan book growth



Source: Company data, Nomura research

Fig. 45: CASA build-up for SFBs still nascent; Bandhan has seen strong momentum

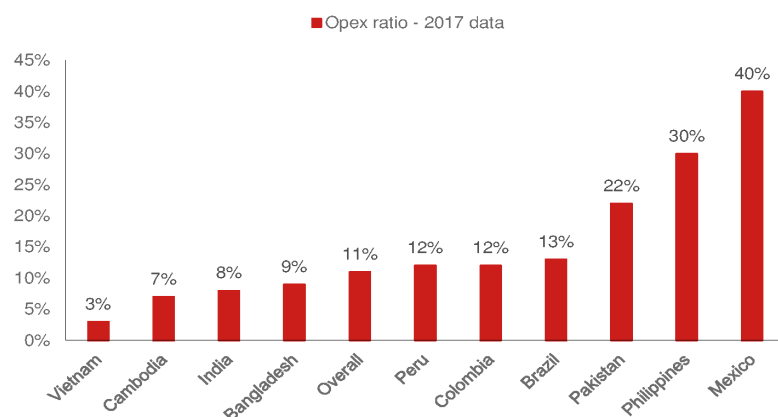


Source: Company data, Nomura research

Opex efficiency – Indian MFIs best-placed globally

- Indian MFIs have meaningfully improved their operational efficiency over the past decade, and remain one of the most efficient class of MFIs globally. Based on 2017 data, opex/AUM for Indian MFIs stands at 8% and is amongst the best-in-class compared to peers and an Industry average of 11%.

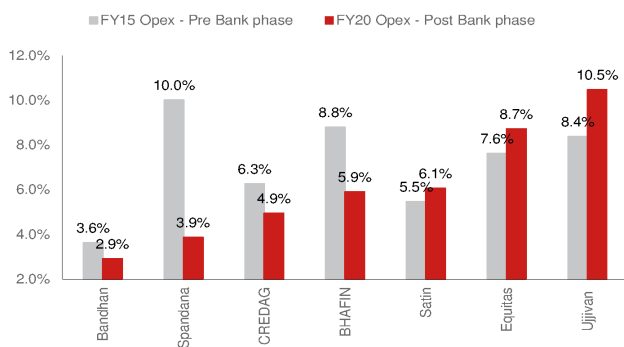
Fig. 46: India is among the best-placed countries in terms of MFI opex efficiency



Source: Global Benchmark Report, Nomura research

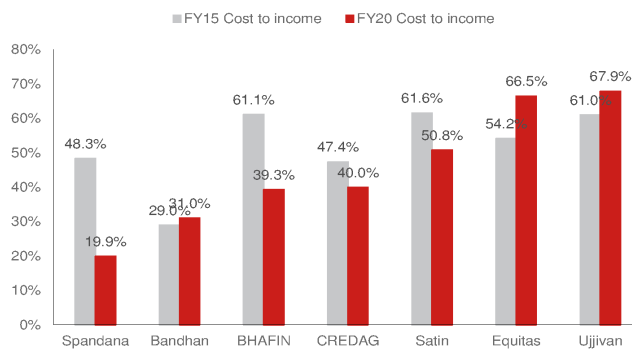
- Opex/AUMs have improved further since FY15 to 4-6% for most top players, barring MFIs turned into SFBs, which have been dragged by branch banking-related costs. That said, even SFBs' branch-banking drag is largely behind us now and opex ratios should continue to improve from here on, in our view.
- We look at BHAFIN to benchmark for cost efficiency delivered over time and note that its opex/AUM improved from ~8-9% in FY14/15 (partly lower growth impact post the Andhra crisis) to ~6% in FY19. Spandana's opex intensity has also reduced as it got back to growth after exiting corporate debt restructuring (CDR) in FY17 – currently ~4% compared to 10% in FY15 (AP crisis impact on growth). Moreover, as the share of individual lending picks up and the book duration increases over time, we expect cost ratios to improve further for the sector.
- Within the top players, Bandhan remains the most efficient player with opex/AUMs of just 3.8-3.9% as of FY18-19; further opex improvement to <3% is not directly comparable due to the Gruh merger while SFBs' opex ratios remain high at 6.5-8.5% for Equitas and Ujjivan due to branch-banking drags and investments in new asset verticals. For NBFC-MFIs like CREDAG, Spandana, BHAFIN and Satin – opex/AUM has improved to 4-6% for FY20, from 6-10% in FY15.
- Cost-to-income ratios for NBFC-MFIs have improved to 30-40% levels for FY20, compared to 50-60% levels seen in FY15, aided by a pickup in growth. With a cost-to-income ratio of 30%, Bandhan continues to be among the best in league, while the cost-income ratio remains elevated for SFBs at 65-70%.
- Improving cost efficiency has been noted despite the 6-30% CAGR for branch networks and 20-35% CAGR for the employee base over the past five years for the top players, aided by strong growth at 30-45% for all players.

Fig. 47: Opex/AUM for top players – FY15 (pre-bank) vs. FY20 (post-bank for some players)



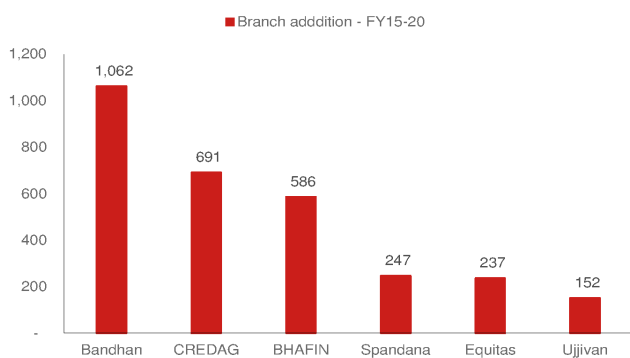
Note: BHAFIN data for FY19
Source: Company data, Nomura research

Fig. 48: Cost-to-income for top players – FY15 (pre-bank) vs. FY20 (post-bank for some players)



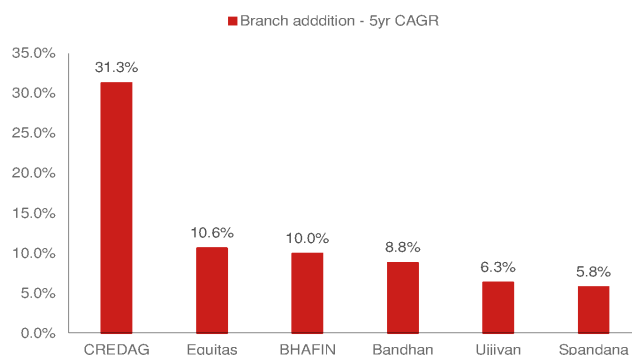
Note: BHAFIN data for FY19
Source: Company data, Nomura research

Fig. 49: Absolute branch additions over FY15-20



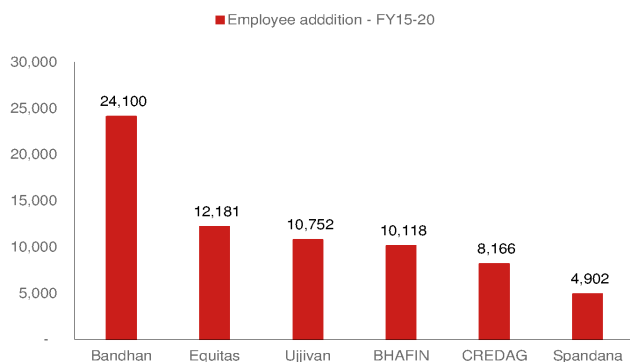
Note: DSCs for Bandhan
Source: Company data, Nomura research

Fig. 50: Branch addition CAGR over FY15-20 – CRETAG has expanded aggressively



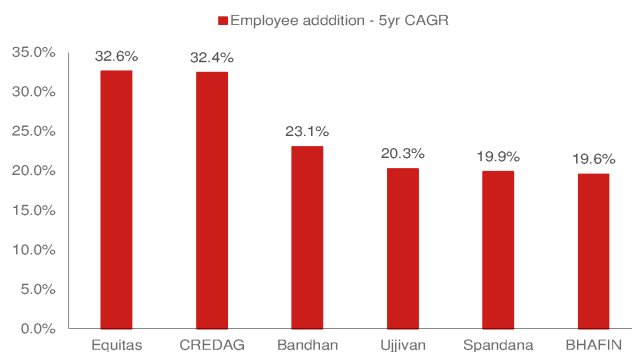
Note: DSCs for Bandhan
Source: Company data, Nomura research

Fig. 51: Employee additions have been high for banks/SFBs due to banking operations

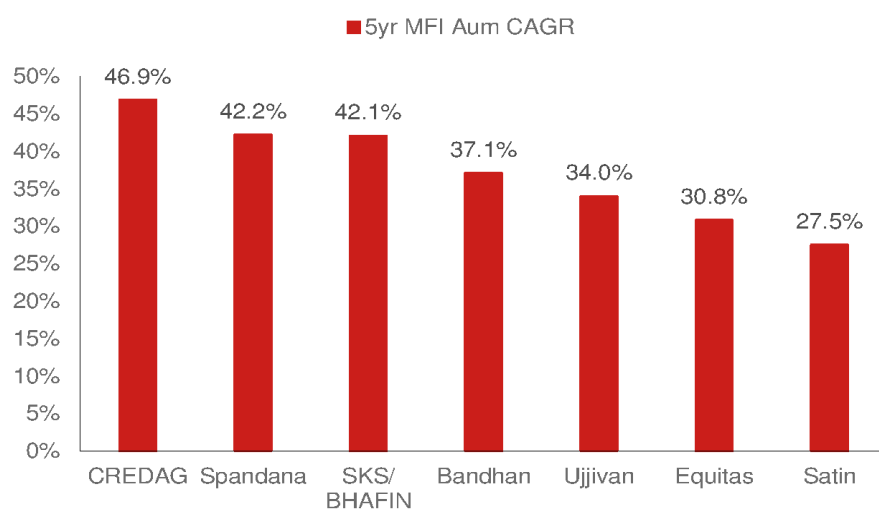


Source: Company data, Nomura research

Fig. 52: 5-year (FY15-20) employee addition CAGR



Source: Company data, Nomura research

Fig. 53: Strong growth across players has supported cost ratios

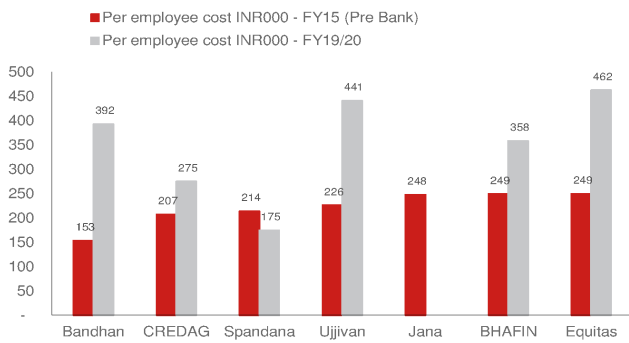
Note: 1) CREDAG is excluding Madura acquisition; 2) BHAFIN – estimated FY20 data; 3) Equitas, Ujjivan based on total AUM growth – for cost comparison purpose

Source: Company data, Nomura research

Employee costs have remained stable for NBFC-MFIs

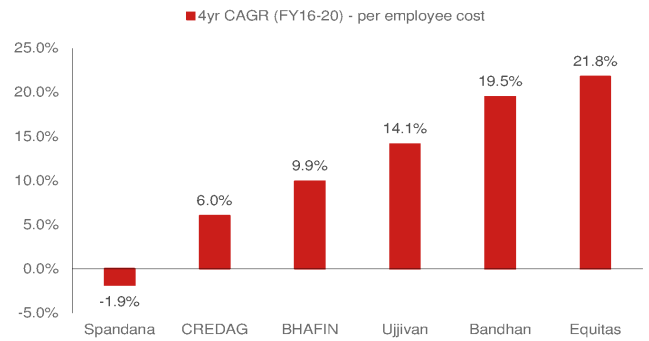
- **CREDAG and Spandana are best-placed on the employee cost metric** with per employee cost <INR0.2mn, and recorded lower per employee cost even in the pre-bank phase and were second only to Bandhan. More importantly, CREDAG and Spandana have been able to maintain employee costs at the same level for the past four years. Higher rural mix at 80-95% for Bandhan, CREDAG and Spandana does help in maintaining a lower employee cost, compared to their more urban-focused peers like Ujjivan and Equitas (40-45% rural mix). Post-bank phase, employee costs for Bandhan, Equitas and Ujjivan are not comparable with NBFC-MFIs due to branch banking and retail lending-related hiring, which have led to a significant spike in their per employee costs.
- **For CREDAG**, lower employee expense is also a function of overall better employee experience in terms of basic needs like food and shelter, better attrition rate at 20-25% compared to 35% for the industry, and its strategy to only hire freshers from nearby villages and no lateral hiring.
- **Employee productivity**: In terms of gross loan portfolio (GLP)/loan officer, CREDAG has an average GLP/loan officer of INR12.8mn and is amongst the best in the Industry, likely driven by higher AUM outstanding per customer. This is despite lower customers per loan officer for CREDAG due to a weekly meeting model followed by CREDAG, limiting the bandwidth per loan officer. GLP per customer and retention remain superior for CREDAG, and thus fills up the opex drag created by weekly collections, in our view. Better GLP outstanding per customer due to multiple loan products within the eligible limits, customer-friendly practices, and more customized offerings based on individual needs lead to better GLP/employee.

Fig. 54: Per employee cost – NBFC-MFIs are best placed



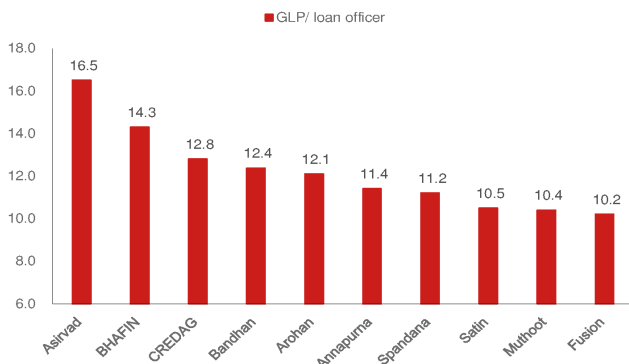
Note: BHAFIN data as of FY19
Source: Company data, Nomura research

Fig. 55: Per employee costs for NBFC-MFIs have remained steady; banks/SFBs are impacted by branch banking drags



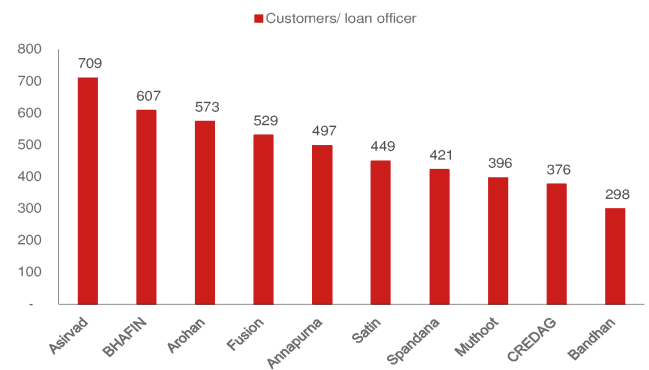
Note: BHAFIN data as of FY19
Source: Company data, Nomura research

Fig. 56: Better ticket size for CREDAG aids better GLP/loan officer despite its weekly model



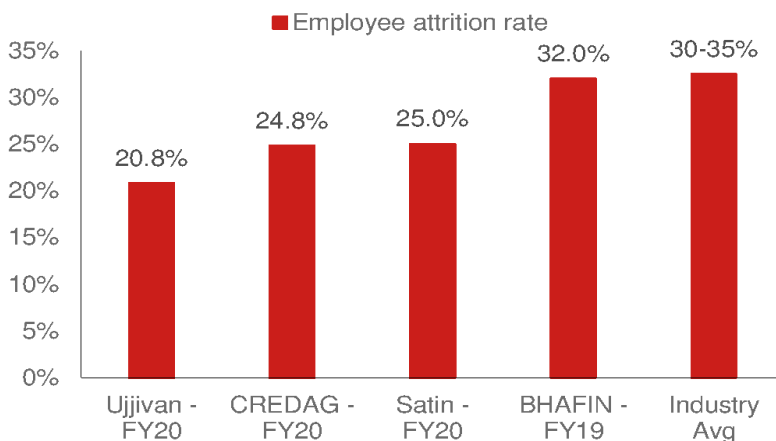
Note: 1) Total employees (branch + asset) used for Bandhan and thus not directly comparable; 2) BHAFIN data for FY19
Source: MFIN, Nomura research

Fig. 57: Weekly model leads to lower customers/loan officer for CREDAG



Note: 1) Total employees (branch + asset) used for Bandhan and thus not directly comparable; 2) BHAFIN data for FY19
Source: MFIN, Nomura research

Fig. 58: Better employee retention for CREDAG also improves cost efficiency



Source: Company data, Nomura research

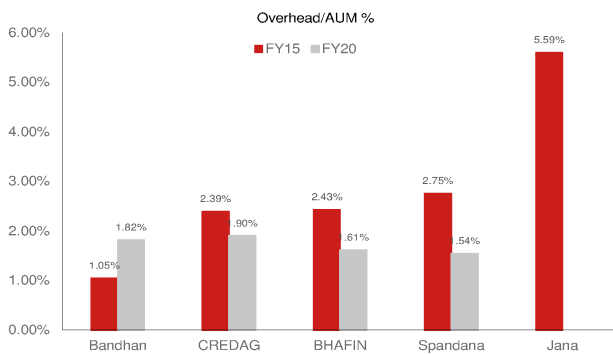
Overheads – SFBs dragged

- Monthly vs. weekly model:** In theory, monthly collection model is more cost efficient, while most large players like Bandhan, BHAFIN, CREDAG and Spandana follow a weekly collection model given the high touch nature of the segment leading to a better asset quality experience. A monthly collection model can aid better scalability as more customers can be handled per loan offer, and is a lot more efficient in terms of travel

and rent costs.

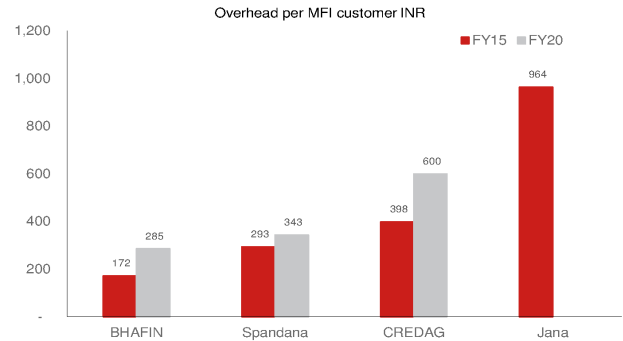
- **Overheads vs. credit cost trade-off:** Despite different cost dynamics between a weekly and a monthly collection model, we do not see a meaningful differentiation in costs given the limitation on the number of customers a loan officer can handle. However, delinquency data for the demonetization phase does show a much superior asset quality experience for the weekly collection model (fig. 60).

Fig. 59: Overheads to AUM trends for top players



Note: BHAFIN data as of FY19
Source: Company data, Nomura research

Fig. 60: Overheads per MFI customer in INR terms



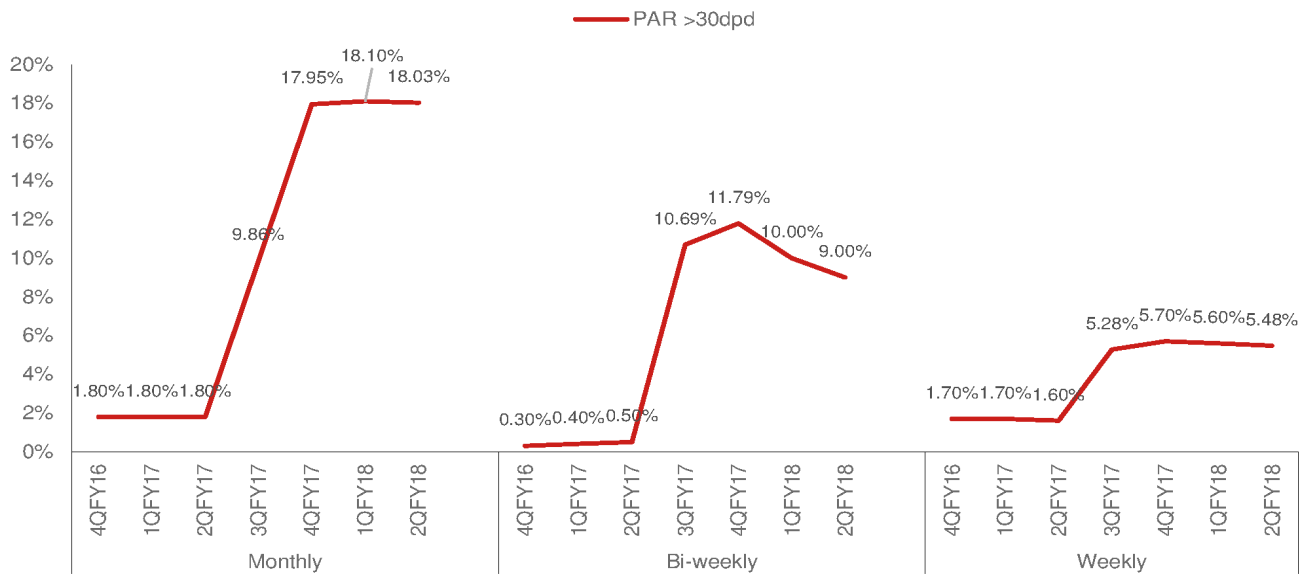
Note: 1) BHAFIN data as of FY19; 2) Bandhan, Equitas and Ujjivan non comparable in post bank phase – thus excluded
Source: Company data, Nomura research

Fig. 61: Collection model cost impact: lower customers per loan officer for weekly collection players like CRETAG and Spandana



Note: 1) Total employees (branch + asset) used for Bandhan and thus not directly comparable; 2) BHAFIN data for FY19
Source: MFIN, Nomura research

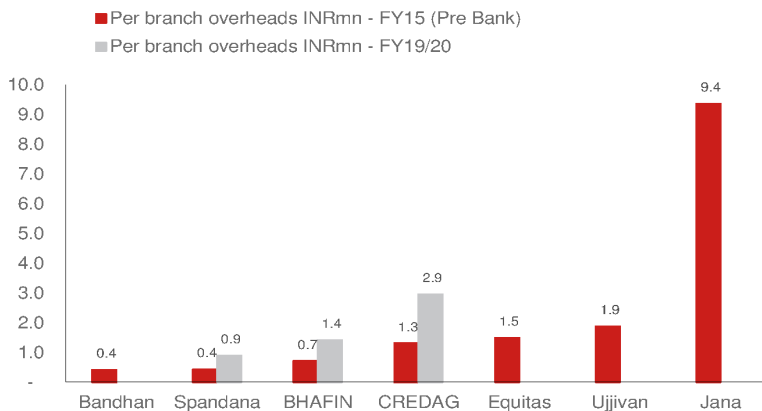
Fig. 62: Varied delinquency experience across collection models during demonetization– weekly collection model proves to be far superior



Source: Company data, Nomura research

- Banks/SFBs vs. NBFC-MFIs:** Overheads for NBFC-MFIs converted into banks/SFBs are not directly comparable due to branch banking drags, and we thus look at the pre-bank phase overheads for top players; more rural-focused players like Bandhan, BHAFIN, Spandana and CREDAG have lower overheads per branch compared to Equitas and Ujjivan, which have been more urban-focused. SFBs/banks have much higher overheads per branch compared to NBFC-MFIs as they invest in building a liability franchise (costlier branches – more urban/semi-urban), as well as a diverse product profile.

Fig. 63: NBFC-MFIs operate at much lower overheads per branch, especially those with a rural focus

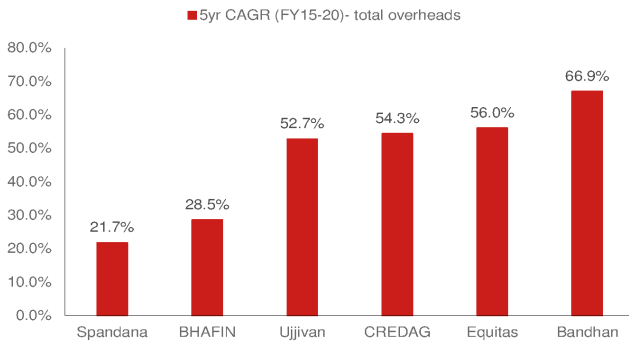


Note: 1) Bandhan, Equitas and Ujjivan FY20 is not comparable due to branch banking drags; 2) BHAFIN data as of FY19

Source: Company data, Nomura research

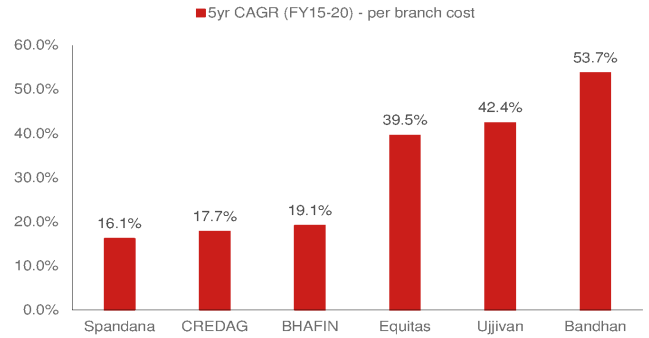
- Overheads per branch CAGRs** for CREDAG and Spandana have been modest at 16-18% over the past four-five years, compared to AUM CAGRs of >40-45%; absolute overheads five-year CAGR for CREDAG has been high >50%, as it added ~700 branches over FY15-20.

Fig. 64: Total overheads CAGR – high for CREDAG as it opened ~700 branches over FY15-20



Source: Company data, Nomura research

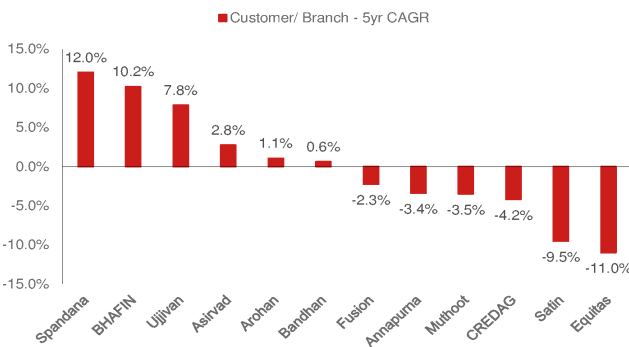
Fig. 65: Average per branch cost increase – higher for banks/SFBs due to banking operations



Source: Company data, Nomura research

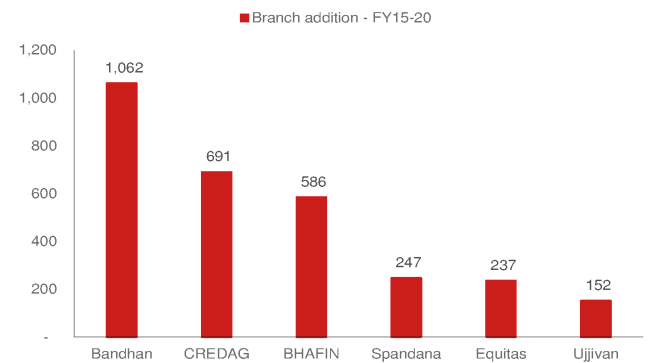
- For CREDAG, network expansion has outpaced customer additions – which reflects in both its customer per branch and GLP per branch growth trends. Over the next two-three years, we expect operating leverage to kick in for CREDAG as newer set of branches mature and start serving more customers, leading to better GLP per branch growth vs. peers.

Fig. 66: Customers per branch growth has been weak for CREDAG due to its aggressive expansion; we expect operating leverage to kick-in



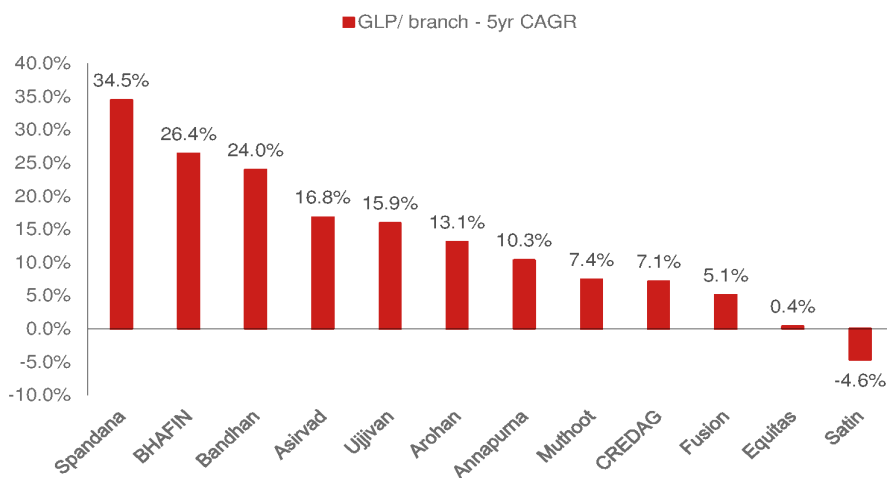
Note: DSCs for Bandhan
Source: Company data, Nomura research

Fig. 67: CREDAG has opened ~700 new branches over the past 5 years



Note: DSCs for Bandhan
Source: Company data, Nomura research

Fig. 68: GLP per branch CAGR across top players

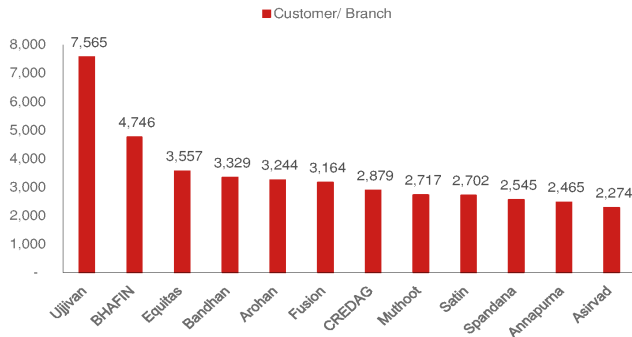


Source: Company data, Nomura research

- Urban vs. rural:** The benefits from greater urban focus (high population density) can

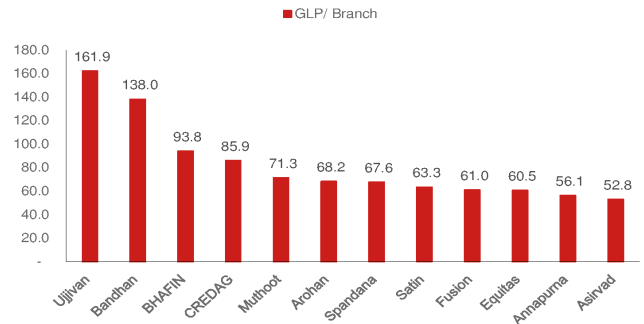
be seen from the higher number of customers served per branch by Ujjivan (~7,500 customers per branch) and Equitas (~3,500 customers per branch) (fig. 67) compared to peers (~2,500-3,000 customers per branch), in addition to the liability accretion benefit for SFBs. Higher footfall per branch translates into best-in-class MFI AUM/branch at ~INR162mn for Ujjivan.

Fig. 69: Urban-focused players like Ujjivan/Equitas enjoy better customer reach per branch due to higher population density



Source: MFIN, Nomura research

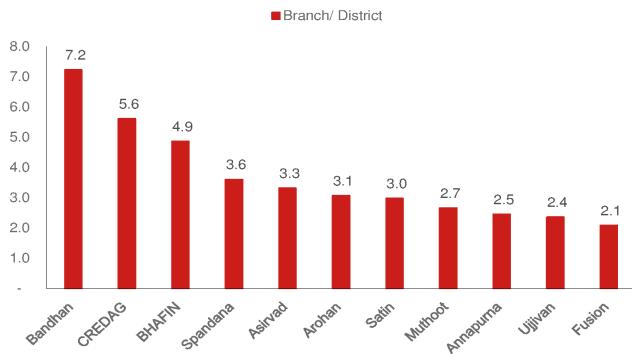
Fig. 70: CRE DAG’s GLP per branch still good vs. peers due to higher average loan outstanding per customer



Source: MFIN, Nomura research

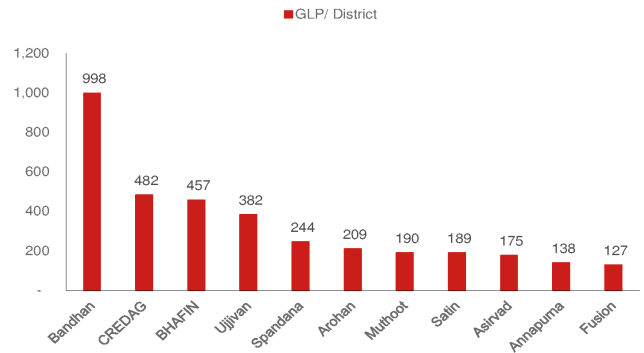
- **CRE DAG strategy:** CRE DAG follows a contiguous expansion model and has been very selective in entering new districts, based on criteria like penetration, competitive landscape, bureau data and past asset quality experience. CRE DAG’s branches/district is also high at 5.6, compared with other players at 2-3 branches/district, leading to a higher GLP/district at ~INR480mn vs. peers at ~INR200-250mn. Bandhan Bank has the highest GLP/district at ~INR1bn due to higher ticket sizes, better customer vintage and higher penetration in its covered geographies.

Fig. 71: CRE DAG has relatively higher branches per district...



Note: DSCs in case of Bandhan
Source: Company data, Nomura research

Fig. 72: ... leading to higher GLP per district served

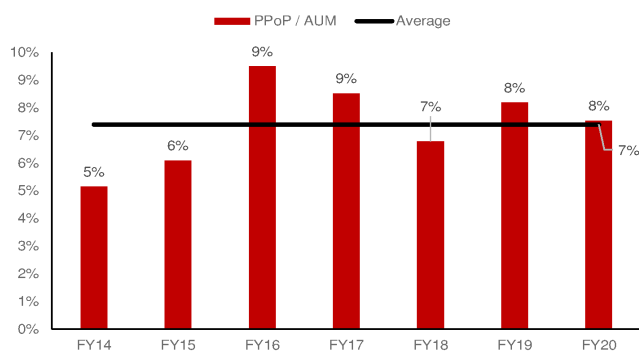


Source: MFIN, Nomura research

Through-cycle profitability has remained strong

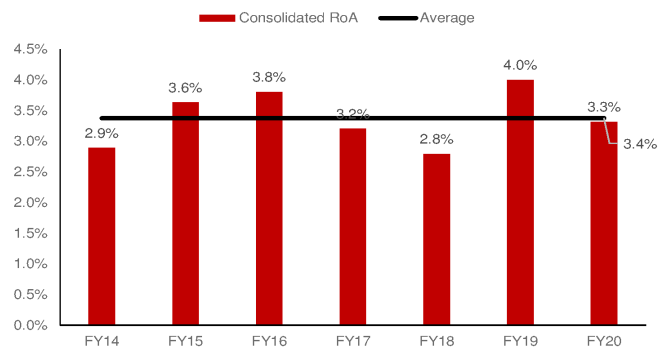
- Microfinance has not only delivered strong growth over the past decade but also strong profitability after the AP crisis. The sector has delivered strong through cycle profitability with PPOP/AUMs averaging 8% over the past 5-7 years, and ROAs of ~3-4% for the top players.
- Leverage has also come down over this period, with MFI players operating at higher capital levels now. Despite reducing their leverage, these top players have delivered ROEs of 17-18% over the past 5-7 years despite frequent disruptions like demonetization (pan India), farm waivers, natural calamities like floods/cyclones in few states such as Odisha, Kerala and Assam.
- COVID-19 pandemic-related disruptions clearly remain one of the key risks in the near-term; however, we expect PPOP/assets of 4-7% for top players, and higher capital levels – tier-1 of 20-30% for top players should be more than adequate to absorb the impact, in our view. Collection efficiency numbers for Sep/ Oct are also indicative of a strong recovery with collections nearing pre-COVID-19 levels. We do pencil in a credit cost of 350-450bps in FY21F in addition to the 50-100bps of contingent provisions created in 4Q20 to factor in the COVID-19 pandemic-related impact and think credit cost impact may be contained (explained in detail in the section below).

Fig. 73: PPOP/AUM for top-7 players has averaged ~8% over the past 7 years...



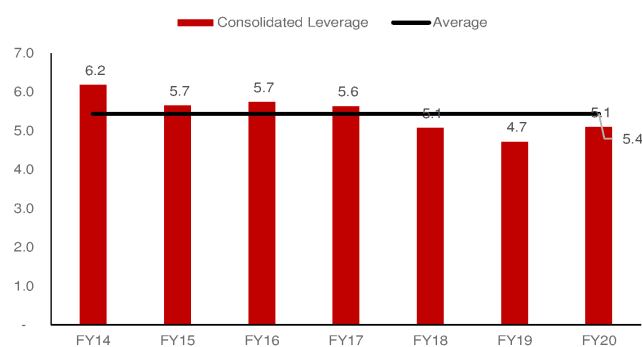
Source: Company data, Nomura research

Fig. 74: ...leading to superior RoAs of 3.5%



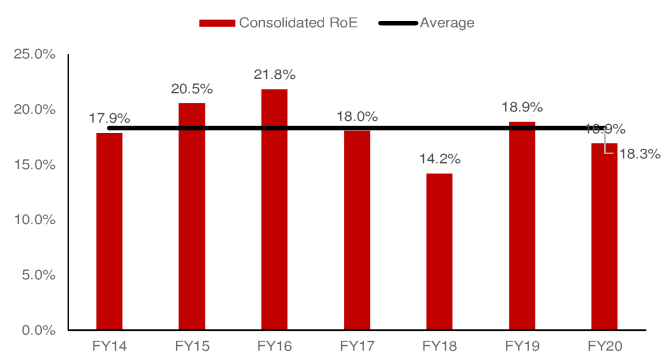
Source: Company data, Nomura research

Fig. 75: Consolidated leverage levels have declined over FY14-20...



Source: Company data, Nomura research

Fig. 76: ...yet through cycle RoEs remain quite strong at 18-19%



Source: Company data, Nomura research

Fig. 77: Key estimates for microfinance players under our coverage

Key microfinance players - NMR estimates			
PPOP	FY21F	FY22F	FY23F
Bandhan	6.28%	6.07%	6.07%
Equitas	3.48%	3.30%	3.50%
Ujjivan	4.68%	4.40%	4.51%
CRE DAG	6.99%	7.28%	7.63%
Credit Cost			
Bandhan	3.50%	1.63%	1.58%
Equitas	2.51%	2.07%	1.56%
Ujjivan	3.58%	2.48%	2.07%
CRE DAG	4.33%	1.99%	1.36%
RoA			
Bandhan	2.81%	3.69%	3.72%
Equitas	1.26%	1.36%	1.73%
Ujjivan	1.46%	1.88%	2.19%
CRE DAG	2.55%	4.09%	4.76%
AUM growth			
Bandhan	13.1%	16.7%	18.7%
Equitas	26.0%	24.5%	23.3%
Ujjivan	8.7%	24.2%	21.5%
CRE DAG	33.7%	25.6%	24.2%
RoE			
Bandhan	16.6%	21.7%	21.5%
Equitas	9.3%	10.3%	13.4%
Ujjivan	8.2%	11.1%	13.9%
CRE DAG	9.9%	14.3%	17.5%
Tier 1			
Bandhan	24.9%	25.3%	25.5%
Equitas	22.8%	20.4%	19.1%
Ujjivan	31.0%	27.6%	25.9%
CRE DAG	31.9%	29.3%	28.1%

Source: Company data, Nomura estimates

COVID-19 impact not small, but manageable

We expect the near-term stress levels to remain elevated given the COVID-19 pandemic-related impact and unsecured nature of the product. Initial trends were concerning with very high moratorium levels; however, the segment has seen much better recovery trends with collection efficiency improving sharply and nearing pre-pandemic levels for most players. While collections at MFIs are still lagging other secured retail products, the pace of recovery – with Sep-Oct collections at 90-93% – gives us confidence that the MFI segment will likely normalize over the next couple of months, and recognition/provision drags will be behind us over the next 2-3 quarters.

We build in 350-450bp credit costs (FY21F) for MFIs under our coverage, in addition to 50-100bps of COVID-19 pandemic-related provisions made in 4Q FY20, as well as some spill-over in FY22F as well, which should take care of the pandemic stress, in our view.

That said, we see multiple reasons which make us believe that credit cost outcomes may not be very severe in the microfinance sector:

1. Increase in credit costs/PAR around demonetization was also a function of multiple upcoming elections in the states of Punjab, Goa, UP and Uttarakhand in the consecutive 12 months of demonetization, which led to wide-scale announcements of farm waivers and hence impacting the repayment behavior.
2. Over the next 12 months, barring West Bengal, Tamil Nadu, Kerala and Assam, there are no upcoming elections and hence we see lower political incentives to impact the sector. We perceive election risks to be potentially higher only for Bandhan and Equitas.
3. State government balance sheets are stretched as well, given the COVID-19 pandemic-related impact, and hence their ability to announce farm waivers, like in the past, is relatively lower. Bihar did not see any disruptions during recent elections – this gives us some confidence as well.
4. In the past, MFI players demanded the entire amount overdue, thereby putting repayment burden on borrowers - who ultimately defaulted. In the current environment, with COVID-19-related moratoriums granted, customers have to start paying only single EMI as the loan tenure gets extended. This will not put unnecessary burden on borrowers, in our view, and given that customers are not interest-sensitive and remain largely perpetual borrowers, the tenure extension won't hurt MFI players as well.
5. Furthermore, the COVID-19 pandemic impact on the rural economy has been much lower due to lesser COVID-19 infections, good monsoon and farm cashflows and the lockdowns were not too stringent; hence, we think the rural segment (56% of the industry) will see meaningfully lower credit costs while the urban segment may see higher impact.

Fig. 78: State assembly elections – timeline for the next 12 months vs demonetization period

Assembly elections timeline	States
Pre - Demonetisation period	
	Assam
Apr/ May 2016	West Bengal
	Tamil Nadu
	Kerala
Post - Demonetisation period	
	Punjab
	Goa
Feb/ Mar 2017	Uttar Pradesh
	Uttarakhand
	Manipur
Nov 2017	Himachal Pradesh
Dec 2017	Gujarat
Next 12 months	
Oct/ Nov 2020	Bihar
	Assam
	West Bengal
Apr/ May 2021	Tamil Nadu
	Kerala

Source: Nomura research

Fig. 79: Farm loan waivers in the past have also impacted delinquencies

State	Year announced	Amount announced INRbn
Andhra Pradesh	2014-15	240.0
Telangana	2014-15	170.0
Tamil Nadu	2016-17	52.8
Maharashtra	2017-18	340.2
Uttar Pradesh	2017-18	363.6
Punjab	2017-18	100.0
Karnataka	2018-19	440.0
Rajasthan	2018-19	180.0
Madhya Pradesh	2018-19	365.0
Chhattisgarh	2018-19	61.0
Total		2,364.6

Source: RBI, Nomura research

Fig. 80: Collection efficiencies nearing pre-COVID-19 levels for most top players

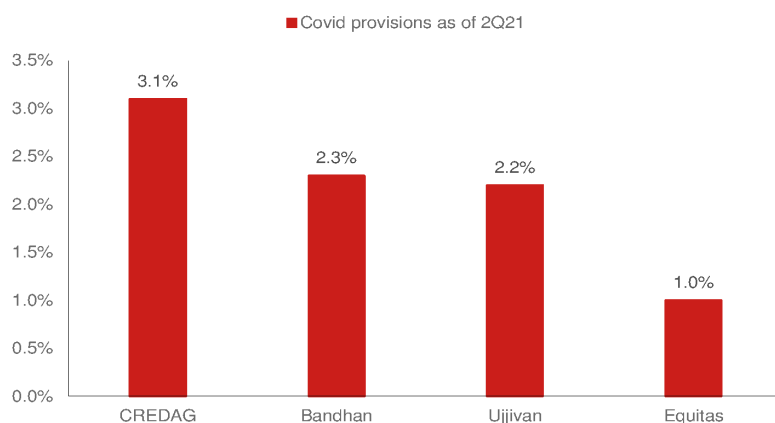
MFI collection efficiency (%)	Covid							
	Mar-20	Apr-20	May-20	Jun-20	Jul-20	Aug-20	Sep-20	Oct-20
Ujjivan	93.0%	2.0%	14.0%	53.0%	60.0%	68.0%	83.0%	88.0%
Equitas	77.0%	0.0%	7.0%	42.0%	61.0%	77.0%		91.0%
BHAFIN			12.5%	71.0%			91.0%	93.0%
Satin		3.0%	17.0%	62.0%	85.0%	86.0%	94.0%	
Spandana		2.0%	23.0%	60.0%	75.0%	80.0%	88.0%	93.0%
CREDAG	98.0%	0.0%	0.0%	74.0%	76.0%	82.0%	88.0%	89.0%
Bandhan				68.0%			89.0%	91.0%

Source: Company data, Nomura research

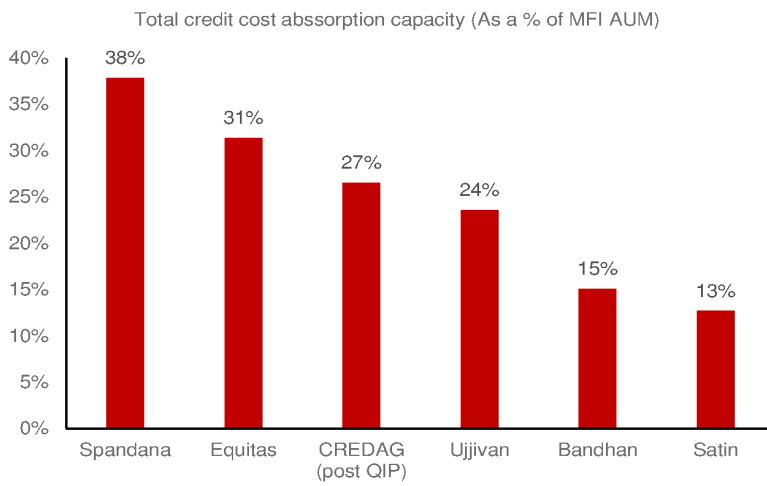
Top players can absorb 13-40% of credit costs (MFI book)

- We run a sensitivity analysis to look at the top players' ability to absorb credit costs, assuming minimum capital (tier-1) level of 15%.
- COVID-19 pandemic-related provisions of 100-300bps have already been made for our covered MFIs. With minimum tier-1 assumed at 15% and PPOP/AUM assumed to be sustainably 10% below the FY18-20 aver, we expect the top players to be able to further absorb 13-40% credit cost of the MFI book; assuming a 90% loss given default (LGD), this can help absorb slippages of 14-45% over FY21/22F.
- As explained earlier, we think there are multiple factors which make us believe that credit costs may positively surprise.

Fig. 81: Key MFI players have already created 100-300bps of COVID-19 contingent cover



Source: Company data, Nomura estimates

Fig. 82: Credit cost absorption capacity for top MFI players

Source: Company data, Nomura estimates

Key risks

Microfinance remains a high-risk segment

- While growth opportunity remains large, the sector has seen multiple risk events in the past leading to spikes in credit costs and NPAs.
- However, the sector has come a long way after the AP crisis (2010), especially with the sector coming under RBI regulation and the emergence of credit bureaus. That said, most of the recent credit events have been more politically inflicted while ultimate credit loss from natural calamities have been limited.
- In that context, we see concentration risks to be one of the key risks in microfinance. During the AP crisis as well, 62% of India's MFI GLP was concentrated in Andhra Pradesh. Top 3 MFIs – SKS, Spandana and Share – had significant exposure to AP, ranging from 35-50% of their books. Top 5 of the 6 largest MFIs in AP had to restructure under the CDR scheme as a result of the disproportionate exposure to AP, and the inability to deal with such high write-offs.
- That said, we see some merits in having concentrated exposures as well – for example, the credit experience in home geographies for the MFI players has been better than peers, given the deeper penetration and better connect with customers. Also, it does help in reducing the frequency of such credit events.
- Further, incrementally MFI players such as CREDAG have been choosing to diversify its district-wise exposure rather than diversifying across states, like in the case of Ujjivan. This not only helps in maintaining customer connect and strengthening market understanding, but also in mitigating concentration risks to a great degree. This also aids in a much better cost management. That said, we also think that a “state” remains an important administrative unit for the purpose of asset quality assessment, and usually the impact of certain events is seen across districts in a state.
- In the section below, we analyze the past MFI cycles/calamities and their impact on key players, delinquencies and final credit cost outcomes.

Lower entry barrier has been another key risk

- Lower entry barrier has been one of the key risks in the sector which has seen a surge in PE-backed MFIs chasing high growth and high ROEs that the segment offers.
- This has led to a significant rise in the number of MFIs operating in various states over the past 5-6 years. This is evident from the steep rise in MFIs in faster-growing states, e.g., Assam, Bihar, Chattisgarh, Gujarat, Haryana, Jharkhand, MP, Orrisa, Rajasthan, UP and West Bengal have seen a significant rise in the number of NBFC-MFIs operating in the region (10-15 new players added over the past 3-4 years).
- Hence, we think it is best to stick to more disciplined players in the sector – which have a much better learning curve from its past mistakes.
- That said, we do acknowledge that there is limited scope to escape from this risk as with increasing competitive intensity, even stronger players get impacted. Bandhan Bank has seen its unique customer mix falling from 70% in FY17 to 50% currently, with a rise in the number of MFIs operating in that segment.

Fig. 83: Significant increase in the number of MFIs operating across most states

State wise Count of NBFC-MFIs operational	FY12	FY14	FY17	FY20
Assam	7	6	6	19
Bihar	14	17	15	35
Chattisgarh	8	8	16	27
Delhi	8	9	5	4
Gujarat	16	18	11	22
Haryana	10	9	11	21
Jharkand	7	10	12	28
Karnataka	15	18	12	18
Kerala	7	7	7	10
Maharashtra	17	22	24	26
Madhya pradesh	17	21	19	26
Orrisa	11	11	13	27
Punjab	4	5	8	13
Rajasthan	12	14	14	24
Tamil Nadu	24	20	10	18
Uttarakhand	7	10	10	12
Uttar Pradesh	14	15	15	29
West Bengal	11	12	8	23

Source: MFIN, Nomura research

COVID-19 pandemic-related impact remains a key near-term risk

- We build in 350-450bps credit costs (FY21F) for MFIs under our coverage, in addition to 50-100bps of COVID-19 pandemic-related provisions made in 4Q FY20 and some spill-over in FY22F as well, which should take care of the pandemic stress, in our view. However, higher-than-expected COVID-19 stress remains a key near-term risk.

Appendix

Learnings from the past cycles

Krishna Crisis 2006

- Across the whole Krishna district (in the state of Andhra Pradesh) 50 offices of leading MFIs including Spandana, Asmita and Share were shut by the local government, impacting collections, and clients were instructed to not repay loans. Of the INR20bn of total loan outstanding in AP – INR10bn was lent in the Krishna district and INR6bn in the nearby Guntur district.
- **What led to it?** – Very high interest rates, coercive collection methods, and exorbitant profiteering from poor and under-privileged.
- **Impact** – RBI intervention prevented prolonged shutdown, although funding and borrowing rates for MFIs were impacted in the shorter run. MFIs agreed to bring down interest rates and to introduce a code of conduct. The situation lasted for eight months. However, the code of conduct was implemented in theory only and lending practices remained aggressive, leading to over-leveraging even later on.

Karnataka Crisis – 2009/10

- During Jan/ Feb 2009, in the town of Kolar in Karnataka, the local community body directed non-payment of MFI loans and prohibited any dealings with the MFIs in light of an attempted suicide case; the Muslim community formed 60-70% of the borrowers at the time. Default rates for Kolar increased to ~35%. ([link](#))
- The Association of Karnataka Microfinance Institutions (AKMi) *report* (published in April 2010) suggests overleveraging, irresponsible lending practices did exist, which along with community issues, led to the crisis. The local Muslim community body, in light of an attempted suicide case, issued fatwa prohibiting all dealings with MFIs – triggering mass defaults.
- MFI practices like lending to women borrowers (due to better repayment profile compared to men), regular group meetings with unrelated men (loan officers), and filing of personal photographs, etc., were considered in violation of its socio-cultural norms by the local Muslim community.
- The Kolar incident spread out to the nearby districts of Sidlaghatta (default rates 8-28%), Ramnagaram (default rates 6-30%) and Mysore (default rates 5-60%). The defaults were partly incited by the events in Kolar and the socio-communal issues, and partly due to the silk industry slow-down due to GFC, while raw material prices rose sharply leading to significant stress for borrowers. In Mysore, communal riots lead to widespread disruption and impacted the repayment capacity of borrowers in April-July 2009.

Fig. 84: Karnataka 2009/10 disturbances – timeline

Date of first mass default	02-Feb-09	3-10 March 2009	8-9 May 2009	19 May/ 2-5 July 2009
Town/ District	Kolar	Sidlaghatta	Ramanagaram	Mysore
Trigger in the operating environment	Attempted suicide led to Anjuman Committee edict that no Muslim client should repay MFI loans	Rise in input prices over the previous 6 months led to payment difficulties – Kolar provided excuse for mass default	Announcements from the local Masjids banning repayment of MFI loans	Communal riots led to business failure.

Source: AKMi Report, Nomura research

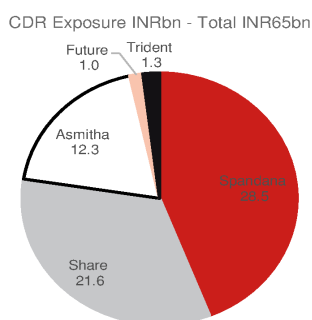
AP Crisis – 2010

- The AP government in October 2010 enacted an ordinance disallowing MFIs to make weekly collections; they were forced to move to monthly collections and could not conduct door-to-door collections (only allowed in public places), and coercive methods were prohibited. AP was an important state for MFI players at that time, with 62% of the industry GLP concentrated in AP in FY11. Industry leaders like BHAFIN, Share and Spandana had significant exposure to AP, ranging at 35-50% of their book. Five out of top six AP players had to undergo corporate debt restructuring (CDR).
- **Reason to enact the ordinance:** The ordinance was enacted on the grounds that

MFIs were charging usurious interest rates, and were using coercive means of collections – which in certain cases had led to suicides.

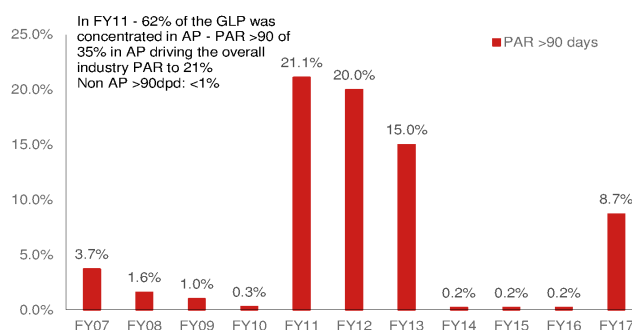
- This, coupled with political instigation to not repay loans, led to mass defaults. AP was particularly overheated, and multiple and irresponsible lending led to over-leveraging; as per *reports*, average household debt in AP at that time was INR65,000, compared to national average of INR7,700.
- Note that 84% of households in AP had two or more loans, while as high as 58% had 4 or more loans at that time. *Reports* suggest delinquency levels had already started rising in June 2010, while lenders managed to hide them by rolling over loans before reports of borrower suicides started emerging in Sept/Oct 2010.
- **Impact:** Over 9.2mn loans worth INR72bn (about USD1.5bn at that time) became overdue, and 90% remained unpaid even by April 2012. Banks panicked and stopped lending to MFIs all over India, leading to funding issues for the whole sector.
- Five players (excluding BHAFIN) of the top 6 operating in AP had to undergo CDR (INR65-70bn of debt was restructured).

Fig. 85: 5 of the top 6 MFIs in AP had to undergo CDR



Source: Company data, Nomura research

Fig. 86: PAR90 inched up significantly to +20% levels during the AP crisis; PAR90 was 35% for AP (+60% of India MFI AUM)



Source: Company data, Nomura research

• Player-wise impact:

- **Bharat Financial (formerly SKS):** BHAFIN was the largest MFI player at that time and had large presence in AP. It was the only listed MFI player and had just concluded its IPO in August 2010, before the AP ordinance came into effect in October 2010. Of its ~INR45bn odd loan book at the time, 35-36% of the same was in AP (~INR15bn of loans).
- BHAFIN over the next 2-3 years had to eventually write off effectively +90% of its exposure to AP. Its net worth declined by 75-80% as a result, thus forcing it to de-grow its loan book to meet capital adequacy requirements. It was the only MFI amongst the top 7 in AP to not get into CDR.
- BHAFIN went on to raise INR2.3bn in its QIP issue in 1Q13 and returned to profitability there from, leading to capital generation internally. BHAFIN was thus able to recoup a significant part of the lost market share – 10% market share in FY19/20, compared to 14% market share in FY11.
- BHAFIN was eventually acquired by IIB in an all-stock deal worth ~INR150bn in October 2017.
- **Spandana ([link](#)):** Prior to the AP crisis, Spandana was the second-largest MFI with an INR45bn portfolio (12% market share in FY11), with 51% of it sitting in AP, and thus was severely impacted during the crisis – impacting its performance over the next 6-7 years.
- In 2014, it started generating profits again, and got its CDR debt refinanced in 2017 by raising USD275mn in debt and equity, and moved out of the CDR mechanism – post which it has started to grow meaningfully since FY18, and has improved its market share to 3% from 1% in FY17.
- **Share Microfin and Asmitha Microfin:** Share Microfin was the third-largest MFI in the country with an AUM of INR20bn (7% market share) and 3.3mn clients, and

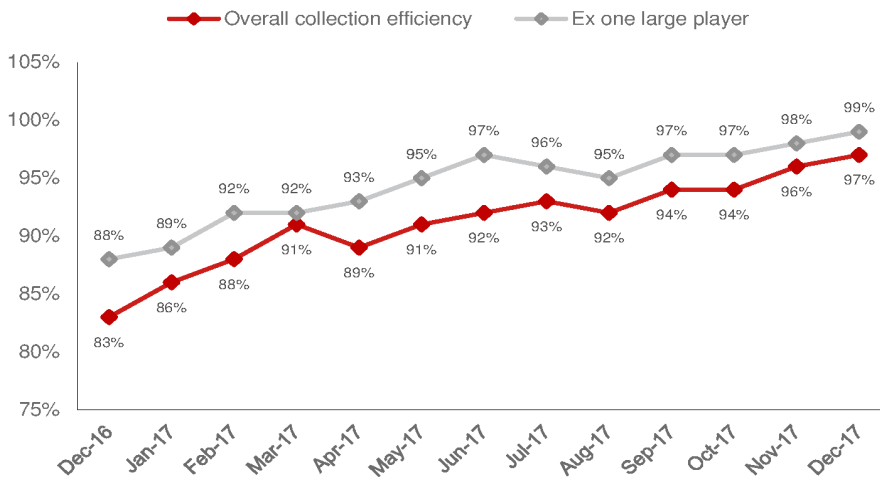
had been operating since 1989.

- Share Microfin underwent an INR19bn debt restructuring after the AP crisis. Its current loan book at ~INR8bn is barely one-third of the pre-AP times (<0.5% market share).
- Asmitha had an AUM of INR14bn as of FY10, of which 50% was concentrated in AP. Share Microfin and Asmitha had entered into an arrangement to demerge their AP and non-AP portfolios into one company – Share to hold non-AP portfolio, while Asmitha to hold AP portfolio.
- **Trident Microfin ([link](#))**: Trident had initiated operations in 2007. Trident was relatively small with INR1.4bn in AUM as of Jun-2010 (<1% market share), but was predominantly AP-based.
- Despite efforts to revive the company under the CDR mechanism, Trident was unable to recover bad debts from AP (80% of the loan book in AP at the time of ordinance), and thus its condition only deteriorated further.
- The CDR cell eventually asked the lenders' consortium to consider a one-time settlement offer of 18%. Trident was the only company to be wound up of the 6 CDRs from the AP crisis.
- **Future Financial Services ([link](#))**: FFSL was the first MFI to be admitted under the CDR mechanism. It had 23% of its portfolio in AP at the time of ordinance, and was severely impacted. FFSL was successfully able to complete a turnaround, with its private equity shareholder India Value Fund Advisors (IVFA) raising its stake from 18% to 45.3% over multiple capital infusion rounds. FFSL was later acquired by Disha Microfin, which now operates as an SFB – Fincare small finance bank.

Demonetization - Nov/Dec 2016:

- In November 2016, the government of India announced the demonetization of bank notes of INR500 and INR1,000 denominations, which resulted in a severe cash crunch and a sizeable loss for the industry. MFI industry is heavily dependent on cash, and thus, the shortage of cash lead to a direct impact on repayment capabilities.
- In the aftermath of demonetization, inadequate currency supply, political interference in some states, and disruption in borrower cash flows led to a sharp dip in MFIs' collection efficiencies (from over 98% prior to demonetization to approximately 75-80 % in November and December 2016). However, subsequently, overall monthly collection efficiencies (including overdue collections) improved to 97% in December 2017, from sub-90% as of March 2017.
- Overall industry had to write-off 5-10% of loans. Meanwhile, RBI had granted a 60 day moratorium on loan repayments, which was construed as loan waiver by many borrowers – this was also one of the reasons for the rise in delinquencies. Farm loan waivers in certain states like Maharashtra, Uttar Pradesh, Karnataka and Punjab during the same time also sparked confusion, leading to lower collections.
- Political parties also *fueled defaults* in some of the states like Maharashtra, UP, Punjab, Goa, as assembly elections were in vicinity then. This, in addition to the high number of MFIs operating in these states, led to much higher delinquencies in these states, compared to the national average.

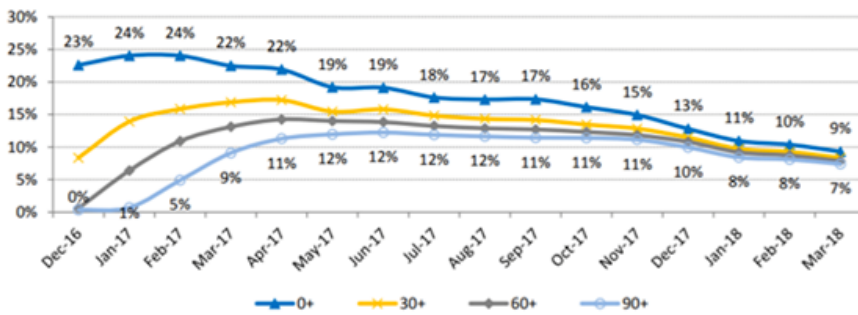
Fig. 87: Collection efficiency post-demonetization



Source: ICRA, Nomura research

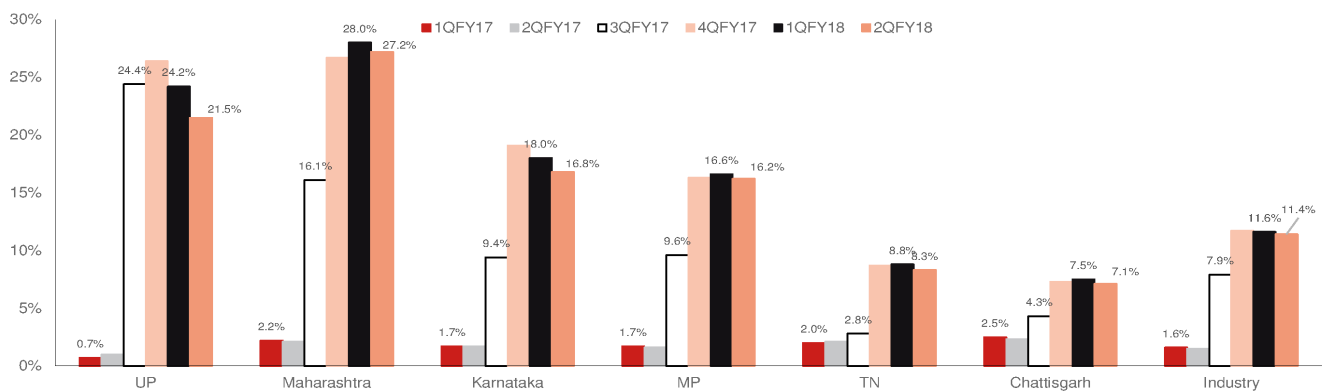
Fig. 88: Delinquency trends across various cohorts post-demonetization

Month on month trends in asset quality post demonetization



Source: ICRA, Nomura research

Fig. 89: State-wise PAR >30 delinquencies during demonetization



Source: ICRA, Nomura research

Fig. 90: Assembly elections around demonetization also caused some disruptions in election states

Assembly elections timeline		States
Pre - Demonetisation period		
		Assam
Apr/ May 2016		West Bengal
		Tamil Nadu
		Kerala
Post - Demonetisation period		
		Punjab
		Goa
Feb/ Mar 2017		Uttar Pradesh
		Uttarakhand
		Manipur
Nov 2017		Himachal Pradesh
Dec 2017		Gujarat
Next 12 months		
Oct/ Nov 2020		Bihar
		Assam
		West Bengal
Apr/ May 2021		Tamil Nadu
		Kerala

Source: Nomura research

Fig. 91: Farm loan waivers also contributed to rising delinquencies during demonetization

State	Year announced	Amount announced INRbn
Andhra Pradesh	2014-15	240.0
Telangana	2014-15	170.0
Tamil Nadu	2016-17	52.8
Maharashtra	2017-18	340.2
Uttar Pradesh	2017-18	363.6
Punjab	2017-18	100.0
Karnataka	2018-19	440.0
Rajasthan	2018-19	180.0
Madhya Pradesh	2018-19	365.0
Chhattisgarh	2018-19	61.0
Total		2,364.6

Source: RBI, Nomura research

Fig. 92: State-wise delinquency trends

States	FY16	1QFY17	2QFY17	3QFY17	FY17	1QFY18	2QFY18	3QFY18	4QFY18	1QFY19	2QFY19	3QFY19	4QFY19	1QFY20	2QFY20	3QFY20	4QFY20	
PAR 30																		
Karnataka	0.49%	0.44%	0.40%	5.67%	18.00%	4.94%	4.40%	4.19%	3.70%	3.41%	2.04%	1.57%	1.13%	1.20%	1.95%	3.24%	3.76%	
Tamil Nadu	0.21%	0.21%	0.37%	1.04%	14.00%	1.92%	1.67%	1.90%	1.50%	1.36%	1.09%	1.67%	2.07%	1.20%	2.29%	3.07%	2.14%	
Uttar Pradesh	0.39%	0.44%	0.76%	28.72%	37.00%	23.67%	17.68%	14.08%	10.80%	6.34%	5.89%	4.99%	3.17%		2.91%	2.71%	1.98%	
Maharashtra	0.29%	0.32%	0.44%	9.10%	28.00%	15.54%	17.44%	14.08%	10.40%	8.37%	4.97%	4.67%	2.73%	0.40%	2.62%	2.53%	1.96%	
Madhya Pradesh	0.46%	0.42%	0.58%	7.15%	17.00%	12.78%	11.51%	8.67%	6.30%	5.22%	3.58%	4.66%	3.34%	1.30%	3.27%	3.04%	2.14%	
Bihar	0.22%	0.17%	0.16%	0.74%	3.00%	0.51%	1.14%	1.20%	0.80%	0.57%	0.51%	0.53%	0.30%		0.34%	0.51%	0.40%	
Odisha	0.09%	0.07%	0.08%	0.36%	1.00%	0.34%	0.63%	0.73%	0.60%	0.49%	0.48%	0.55%	0.59%	0.50%	2.26%	2.24%	1.82%	
West Bengal	0.18%	0.15%	0.21%	2.41%	14.00%	1.81%	3.24%	2.72%	1.10%	0.98%	0.65%	0.74%	0.54%	0.10%	0.89%	1.35%	1.22%	
Gujarat	0.53%	0.66%	0.68%	5.29%	16.00%	7.68%	6.42%				2.89%		1.42%	1.70%	2.72%			
Kerala	0.10%	0.08%	0.07%	0.75%	1.00%	1.46%	2.37%	2.42%	2.70%	2.62%		2.76%	2.28%	0.20%	4.76%	3.79%	3.71%	
Punjab	0.19%	0.20%	0.19%	8.12%	16.00%	18.79%	9.25%	7.17%	5.90%	2.99%	2.68%	2.11%	1.59%		1.28%	1.85%	0.78%	
Rajasthan	0.64%	0.59%	0.56%	8.22%	11.00%	5.11%	7.16%	5.73%	3.70%	1.85%	1.74%	0.97%	0.61%	0.90%	0.76%	1.04%	0.72%	
Jharkhand		0.20%	0.29%	2.82%	10.00%	4.33%	7.48%	5.38%	3.40%	2.37%	2.49%	1.31%	0.92%		1.57%	1.46%	1.22%	
Haryana	0.38%	0.52%	0.70%	13.97%	22.00%	15.39%	15.82%	13.76%	10.50%	6.06%	4.32%	3.58%				1.81%		
Assam	0.07%		0.16%	0.61%	1.00%			1.43%	0.90%	0.67%	0.44%	0.46%	0.33%		0.96%	9.21%	20.95%	
Chattisgarh		0.28%				2.15%	2.22%	1.62%	1.20%	0.88%	1.36%	0.73%	0.71%	0.30%	1.13%	1.48%	1.49%	
PAR90																		
Karnataka	0.33%	0.31%	0.30%	0.34%	12.00%	3.88%	3.40%	3.55%	3.20%	3.03%	1.68%	1.35%	0.91%	1.40%	0.98%	1.04%	2.91%	
Tamil Nadu	0.11%	0.13%	0.26%	0.21%	2.00%	1.15%	1.04%	1.32%	1.00%	0.94%	0.86%	0.69%	0.94%	1.70%	1.36%	1.97%	1.47%	
Uttar Pradesh	0.23%	0.19%	0.36%	0.87%	14.00%	11.17%	12.58%	10.11%	8.40%	4.90%	4.56%	3.95%	2.46%		2.24%	2.05%	1.35%	
Maharashtra	0.19%	0.20%	0.25%	0.40%	20.00%	13.17%	14.76%	12.63%	9.70%	7.70%	4.34%	4.14%	2.31%	0.80%	1.78%	1.93%	1.51%	
Madhya Pradesh	0.30%	0.27%	0.32%	0.59%	9.00%	8.33%	8.07%	6.64%	5.10%	4.20%	2.85%	3.90%	2.54%	1.80%	2.44%	2.22%	1.47%	
Bihar	0.14%	0.12%	0.10%	0.12%	1.00%	0.28%	0.65%	0.77%	0.50%	0.41%	0.35%	0.35%	0.20%		0.21%	0.31%	0.26%	
Odisha	0.06%	0.05%	0.05%	0.15%	0.30%	0.19%	0.40%	0.54%	0.40%	0.36%	0.34%	0.37%	0.42%	1.80%	1.17%	1.41%	1.37%	
West Bengal	0.13%	0.10%	0.12%	0.30%	4.00%	1.27%	2.35%	2.23%	0.90%	0.77%	0.51%	0.54%	0.37%	0.10%	0.62%	0.95%	0.90%	
Gujarat	0.33%	0.40%	0.42%	0.66%	9.00%	4.67%	4.53%				1.71%		1.17%	3.20%	2.12%			
Kerala	0.06%	0.04%	0.05%	0.08%	1.00%	0.72%	1.32%	1.58%	1.80%	1.72%		1.76%	1.44%	0.40%	2.78%	3.15%	2.72%	
Punjab	0.13%	0.12%	0.12%	0.14%	5.00%	9.04%	6.62%	5.34%	4.40%	2.38%	2.17%	1.75%	1.28%		1.02%	1.40%	0.60%	
Rajasthan	0.47%	0.36%	0.31%	0.56%	5.00%	2.61%	5.30%	10.39%	2.80%	1.43%	1.35%	0.73%	0.44%	1.40%	0.52%	0.75%	0.49%	
Jharkhand		0.14%	0.16%	0.40%	5.00%	2.70%	5.56%	4.49%	2.90%	2.07%	2.15%	0.93%	0.68%		1.08%	1.01%	0.92%	
Haryana	0.20%	0.28%	0.37%	0.62%	11.00%	8.03%	11.32%	10.54%	8.40%	5.01%	3.40%	2.70%				1.38%		
Assam	0.04%		0.10%	0.14%	0.30%			1.12%	0.70%	0.53%	0.29%	0.33%	0.24%		0.36%	0.85%	9.89%	
Chattisgarh		0.07%				1.48%	1.59%	1.32%	1.00%	0.69%	0.59%	0.55%	0.49%	0.50%	0.72%	0.98%	1.00%	
PAR180																		
Karnataka	0.19%	0.18%	0.20%	0.25%	0.20%	1.95%	2.36%	2.77%	2.60%	2.57%	1.42%	1.12%	0.71%	0.90%	0.50%	0.45%	0.99%	
Tamil Nadu	0.05%	0.07%	0.13%	0.14%	0.20%	0.63%	0.51%	0.88%	0.70%	0.66%	0.59%	0.45%	0.42%	1.10%	0.38%	0.84%	0.85%	
Uttar Pradesh	0.16%	0.16%	0.14%	0.27%	0.60%	2.27%	8.85%	7.20%	6.30%	3.54%	3.21%	2.83%	1.88%		1.73%	1.51%	0.97%	
Maharashtra	0.08%	0.12%	0.13%	0.16%	0.20%	7.90%	12.99%	10.28%	8.60%	6.99%	3.60%	3.54%	1.93%	0.50%	1.41%	1.31%	1.09%	
Madhya Pradesh	0.17%	0.17%	0.16%	0.19%	0.40%	3.52%	6.02%	4.14%	3.60%	3.15%	2.10%	3.02%	1.92%	0.80%	1.81%	1.61%	1.06%	
Bihar	0.08%	0.08%	0.07%	0.03%	0.10%	0.13%	0.40%	0.49%	0.30%	0.28%	0.24%	0.23%	0.12%		0.13%	0.17%	0.14%	
Odisha	0.03%	0.02%	0.03%	0.08%	0.10%	0.08%	0.25%	0.34%	0.30%	0.25%	0.24%	0.24%	0.23%	1.60%	0.42%	0.75%	0.90%	
West Bengal	0.08%	0.07%	0.07%	0.07%	0.20%	0.66%	1.74%	1.79%	0.60%	0.55%	0.36%	0.40%	0.26%	0.10%	0.40%	0.56%	0.55%	
Gujarat	0.14%	0.20%	0.18%	0.30%	0.40%	1.43%	2.65%				1.01%		0.90%	2.20%	1.06%			
Kerala	0.04%	0.03%	0.04%	0.06%	0.10%	0.26%	0.48%	0.85%	1.00%	1.00%		1.00%	0.80%	0.30%	0.98%	1.72%	2.11%	
Punjab	0.10%	0.07%	0.05%	0.05%	0.03%	0.52%	4.72%	3.98%	3.30%	1.75%	1.60%	1.26%	1.04%		0.87%	1.01%	0.47%	
Rajasthan	0.18%	0.24%	0.13%	0.18%	0.30%	0.54%	3.92%	7.95%	2.10%	1.01%	0.99%	0.47%	0.30%	0.90%	0.37%	0.45%	0.32%	
Jharkhand		0.08%	0.10%	0.15%	0.40%	1.07%	3.16%	3.19%	2.30%	1.68%	1.91%	0.70%	0.39%		0.68%	0.60%	0.57%	
Haryana	0.11%	0.12%	0.15%	0.18%	0.40%	2.52%	7.71%	7.30%	5.90%	3.83%	2.68%	1.88%				0.95%		
Assam	0.03%		0.08%	0.07%	0.10%			0.70%	0.50%	0.39%	0.19%	0.19%	0.14%		0.19%	0.29%	0.70%	
Chattisgarh		0.03%				0.76%	0.98%	0.92%	0.70%	0.52%	0.43%	0.38%	0.31%	0.30%	0.39%	0.54%	0.57%	

Source: MFIN, Nomura research

Fig. 93: Demonetization impact for top players

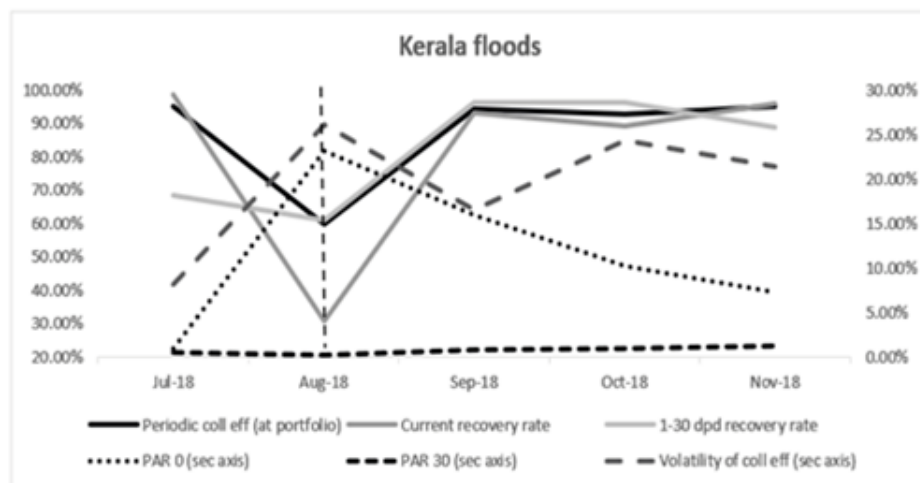
MFIs	Demonetisation impact
Bandhan Bank	Not much impacted through demonetization as West Bengal and Assam were least impacted states.
Ujjivan SFB	Geographically diversified book with Maharashtra/ Karnataka/ West Bengal / Tamil Nadu having relatively higher exposures – 130/450bps of credit cost in FY17/18.
Equitas SFB	Tamil Nadu focused book (less impacted during demonetisation) + Diversified product mix led to lower credit cost experience 165/220bps.
Jana SFB	Having grown very aggressively from INR10bn to INR128bn over FY13-17, Jana was the worst hit during demonetization as it lost significant market share from 13% as of FY17 to 3% in FY19. Over FY18-20 – Cumulative slippages were INR52bn (41% of FY17 o/s GLP) and of which cumulative write-offs were INR31bn (24% of FY17 o/s GLP).
Suryodaya SFB	Large presence in Maharashtra (INR 5bn) and Tamil Nadu (INR5.5bn) – GNPA inched up to 6.2% in FY17 from 16bps in FY16, declined to 3.5% and to 1.8% in FY18 and FY19 respectively – largely write-off driven. Absorbed credit cost of 1.5% /4.2% /1.9% over FY17-19.
CRE DAG	High exposure to Maharashtra (16% mkt share) and Karnataka (25% mkt share) led to higher delinquencies compared to national average as a result– Credit cost of 390/320bps in FY17-18.
Spandana	Karnataka, MP, Odisha, Maharashtra are the key states (Mid single digit market share in all 4 states) - credit cost inched up to 3.3%/1.7% in FY17-18.

Source: Company data, Nomura research

Kerala Floods – August 2018:

- A *study* by Northern Arc Capital on 27,000 loans in the nine impacted districts of Kerala suggested a drop in collection efficiency to 60% from 96% (pre-event) in August 2018, but improved gradually over Sept-Nov 2018. Not much impact was seen in PAR30 >30 – as mostly just a single installment was missed (due to the event). Current recovery rates normalized, starting from September 2018.
- **Key player – ESAF Small Finance Bank** – ESAF SFB had a portfolio outstanding of INR66bn (largely MFIs) as of end-FY20 (INR46bn as of FY19), of which INR37bn (50-55% of the total exposure) lies in Kerala (INR24bn as of FY19) – 35-40% market share in Kerala. Credit costs increased to 240bps for FY19 owing to the flood-related disruption, vs. ~100bps of steady state credit cost.

Fig. 94: Current recovery rates normalized over the next 2-3 months, post Kerala floods

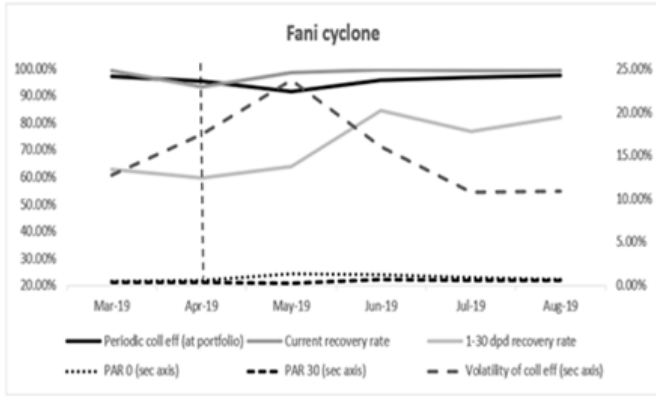


Source: Northern Arc Capital, Nomura research

Cyclone Fani in Orrisa – April 2019:

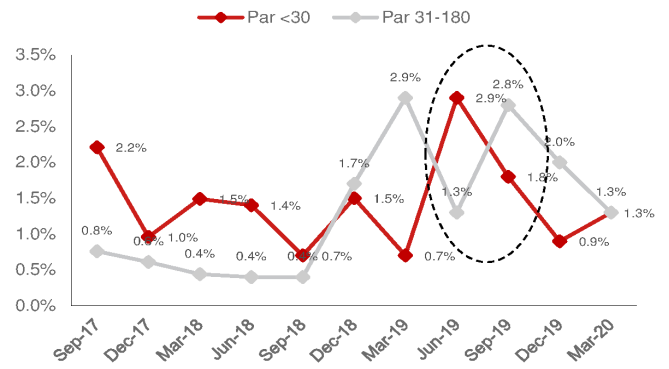
- Based on an *analysis* of 75,000 loans by Northern Arc Capital across 14 districts in Odisha, an immediate drop from 97% to 90% in collections was observed. The pick-up in collections was swift and normalized in two months' time, given that Odisha is accustomed to frequent cyclones.
- We observe that, bounce back from natural calamities has been much stronger compared to moral hazard created by politically motivated interference.
- PAR<30 increased to 290bps, from 70bps in 1Q20; however, it normalized over the next couple of quarters.

Fig. 95: Recovery post the cyclone was quite quick, and current recovery rates touched normalcy in the next month itself



Source: Northern Arc Capital, Nomura research

Fig. 96: PAR book stabilized over the next 2 quarters



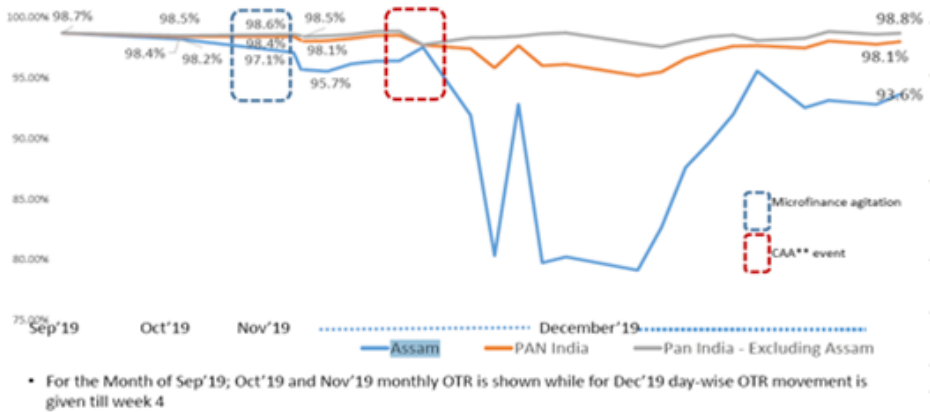
Source: CRIF Highmark, Nomura research

Assam crisis (link) – Nov/Dec 2019

- Towards the end of 2019, MFIs in Assam were impacted due to CAA (Citizenship Amendment Act) protests in December 2019 and protests against the MFIs in November 2019– demanding a ban on MFIs holding them responsible for suicides.
- Internal surveys by Microfinance Institutions network (MFIN) suggest over-indebtedness in Assam (link, link) – 7% of customers have an o/s of >INR1lakh, compared to the national average of 3%.
- Bureau data suggests 22% portfolio (remains high) still in PAR 0-180 bucket in 3Q and 4Q20. The situation in Assam remains precarious and has been further impacted by the recent floods. Bandhan Bank (60% market share) in its 2Q21 commentary reported normalization in repayments in Assam though.

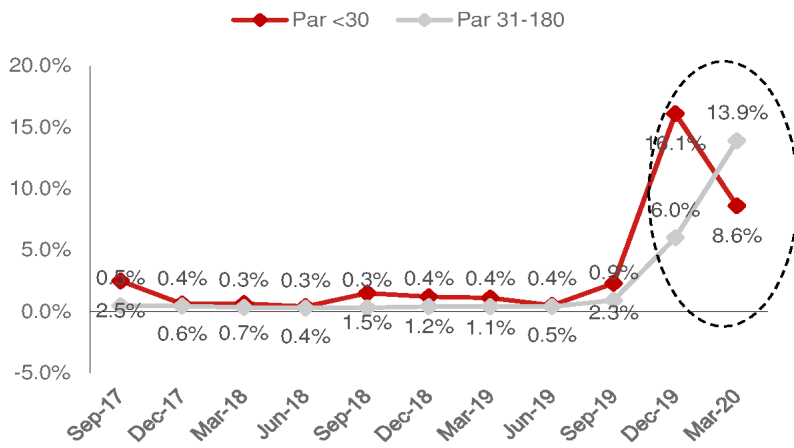
Fig. 97: Bandhan Bank’s collection efficiency shows an improvement post the initial impact

OTR movement for 3Q20



Source: Company data, Nomura research

Fig. 98: Credit Bureau data still reflects high % of overdues – 22% portfolio in 0-180 day bucket as of March-2020



Source: CRIF Highmark, Nomura research

CreditAccess Grameen CRDE.NS CREDAG IN

EQUITY: FINANCIALS

Tailor-made; initiating with a Buy rating

Ticking the right boxes; our TP of INR950 implies 24% upside

Action: Initiating at Buy with a TP of INR950, implying 24% upside

CREDAG is the largest NBFC-MFI in India with consolidated AUM (including Madura Microfinance) of INR112bn (as of Sep-20), implying an industry market share of >5% (16.3% within NBFC-MFI) and recorded a 52% AUM CAGR over FY14-20, with a strong presence in Karnataka, Maharashtra and Tamil Nadu (84% of AUMs). We believe CREDAG is best-positioned to capitalize on the rural opportunity (we estimate 21%/13% five-year CAGR in rural/ urban geographies for the industry) with: (1) its rural focus (86% of AUMs), (2) strong operational practices, (3) tailor-made approach, and (4) strong parentage aiding to record a 19% AUM CAGR over FY20-23F. While COVID does remain a near-term concern and resurgent cases in Maharashtra has led to lower collection efficiency for CREDAG (89% in Oct-20), we think standard provisions of 350bps of AUMs, robust PPOP/AUMs of 7% (FY21-23F average) as well as strong capital position (tier-1 of 25.6%) should not only aid CREDAG in absorbing the COVID impact but also benefit from the medium-term growth opportunity. We initiate coverage on CREDAG with a Buy rating and a TP of INR950.

- **Opportunity still large:** We expect the segment to deliver 18% CAGR over the next five years with faster growth in the rural segment at 21% CAGR, given the large penetration opportunity. We believe CREDAG is best-placed to capitalize on this opportunity with: (1) improving customer vintage-led ticket size growth (68% of borrowers with <3-year vintage), (2) improving branch productivity (~400 CREDAG branches set up over the past two years), and (3) growth opportunity in new geographies (44% of incremental branches beyond top-3 states in the past 3 years).
- **Ticking the right boxes:** CREDAG's customer-centric approach, calibrated branch expansion strategy with deeper penetration, prudent HR practices, strong parentage and prudent underwriting practices make it suited to scale up in this segment and gain dominance.

Valuation and our view; initiating with a Buy rating (24% implied upside)

- Current valuation at 2.3x FY23F book is not undemanding, but with large growth opportunity (19% CAGR over FY20-23F) and superior ROE profile (18% by FY23F), we believe the premium valuations will sustain. We value CREDAG based on residual income model at INR950, implying a 2.7x FY23F book multiple. Higher impact of COVID and concentration risks remain key risks.

Rating Starts at	Buy
Target price Starts at	INR 950
Closing price 09 December 2020	INR 768
Implied upside	+23.7%
Market Cap (USD mn)	1,622.5
ADT (USD mn)	1.2

Research Analysts

India Financials

Amit Nanavati - NFASL
 amit.nanavati@nomura.com
 +91 22 403 74361

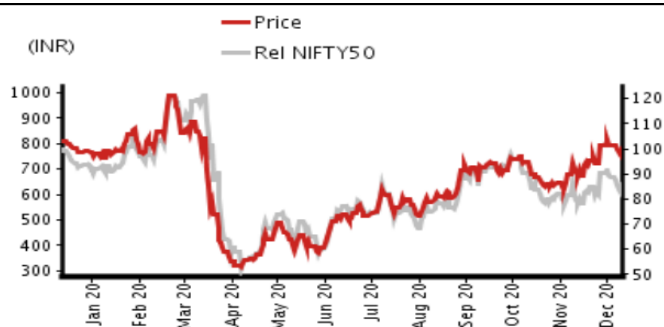
Tanuj Kyal, CFA - NFASL
 tanuj.kyal1@nomura.com
 +91 22 40374220

Year-end 31 Mar	FY20	FY21F		FY22F		FY23F	
Currency (INR)	Actual	Old	New	Old	New	Old	New
PPOP (mn)	6,899		9,074		11,026		14,179
Reported net profit (mn)	3,275		3,314		6,189		8,848
Normalised net profit (mn)	3,275		3,314		6,189		8,848
FD normalised EPS	22.81		20.98		39.18		56.01
FD norm. EPS growth (%)	1.8		-8.0		86.7		43.0
FD normalised P/E (x)	33.6		36.6		19.6		13.7
Price/adj. book (x)	4.1		3.0		2.6		2.2
Price/book (x)	4.1		3.0		2.6		2.2
Dividend yield (%)	-		-		-		-
ROE (%)	13.0		9.9		14.3		17.5
ROA (%)	3.5		2.6		3.8		4.5

Source: Company data, Nomura estimates

Key Data on CreditAccess Grameen

Relative Performance Chart



Performance

(%)	1M	3M	12M		
Absolute (INR)	6.2	17.6	-4.0	M cap (USDm)	1,622.5
Absolute (USD)	7.0	17.6	-7.1	Free float (%)	20.0
Rel to NIFTY50	-2.4	-2.3	-17.3	3-mth ADT (USDm)	1.2

Profit and loss (INRmn)

Year-end 31 Mar	FY19	FY20	FY21F	FY22F	FY23F
Interest income	12,183	16,172	23,531	28,094	35,010
Interest expense	-4,168	-5,727	-8,725	-10,001	-12,208
Net interest income	8,016	10,445	14,807	18,093	22,802
Net fees and commissions	9	38	44	44	55
Trading related profits	566	562	400	300	300
Other operating revenue	75	72	75	140	225
Non-interest income	650	672	519	484	580
Operating income	8,666	11,117	15,325	18,576	23,381
Depreciation	-78	-196	-275	-330	-379
Amortisation	0	0	0	0	0
Operating expenses	-1,001	-1,425	-1,931	-2,242	-2,641
Employee share expense	-1,861	-2,596	-4,045	-4,978	-6,182
Pre-provision op profit	5,726	6,899	9,074	11,026	14,179
Provisions for bad debt	-59	-106	-4,643	-2,752	-2,350
Other provision charges	-689	-2,284	0	0	0
Operating profit	4,977	4,509	4,431	8,274	11,829
Other non-op income					
Associates & JCEs					
Pre-tax profit	4,977	4,509	4,431	8,274	11,829
Income tax	-1,760	-1,234	-1,117	-2,085	-2,981
Net profit after tax	3,218	3,275	3,314	6,189	8,848
Minority interests					
Other items					
Preferred dividends					
Normalised NPAT	3,218	3,275	3,314	6,189	8,848
Extraordinary items					
Reported NPAT	3,218	3,275	3,314	6,189	8,848
Dividends					
Transfer to reserves	3,218	3,275	3,314	6,189	8,848

Growth (%)

Net interest income	30.3	41.8	22.2	26.0
Non-interest income	3.3	-22.8	-6.7	19.9
Non-interest expenses	42.4	35.5	16.1	17.8
Pre-provision earnings	20.5	31.5	21.5	28.6
Net profit	1.8	1.2	86.7	43.0
Normalised EPS	1.8	-8.0	86.7	43.0
Normalised FDEPS	1.8	-8.0	86.7	43.0
Loan growth	38.9	33.7	25.6	24.2
Interest earning assets	38.9	33.7	25.6	24.2
Interest bearing liabilities	60.7	29.9	23.7	23.3
Asset growth		44.9	33.9	20.7
Deposit growth		-	-	-

Source: Company data, Nomura estimates

Balance sheet (INRmn)

As at 31 Mar	FY19	FY20	FY21F	FY22F	FY23F
Cash and equivalents	6,156	5,804	10,689	9,620	10,582
Inter-bank lending	0	0	0	0	0
Deposits with central bank	0	0	0	0	0
Total securities	0	0	0	0	0
Other int earning assets	0	0	0	0	0
Gross loans	66,028	91,726	122,626	154,014	191,281
Less provisions	0	0	0	0	0
Net loans	66,028	91,726	122,626	154,014	191,281
Long-term investments	2	6,614	3,000	3,000	3,000
Fixed assets	271	895	5,569	5,517	5,414
Goodwill	0	0	0	0	0
Other intangible assets	0	0	0	0	0
Other non IEAs	3,836	5,485	6,069	6,373	6,691
Total assets	76,293	110,525	147,954	178,525	216,968
Customer deposits	0	0	0	0	0
Bank deposits, CDs, debentures	48,666	78,226	101,617	125,686	154,952
Other int bearing liabilities	0	0	0	0	0
Total int bearing liabilities	48,666	78,226	101,617	125,686	154,952
Non-int bearing liabilities	3,977	5,609	6,272	6,585	6,915
Total liabilities	52,643	83,834	107,889	132,271	161,867
Minority interest					
Common stock	1,436	1,440	1,580	1,580	1,580
Preferred stock					
Retained earnings	22,215	25,251	38,485	44,674	53,522
Reserves for credit losses					
Proposed dividends					
Other equity					
Shareholders' equity	23,651	26,691	40,065	46,254	55,102
Total liabilities and equity	76,293	110,525	147,954	178,525	216,968
Non-perf assets	335	1,421	4,416	3,962	2,952

Balance sheet ratios (%)

Loans to deposits	-	-	-	-	-
Equity to assets	31.0	24.1	27.1	25.9	25.4

Asset quality & capital

NPAs/gross loans (%)	0.5	1.5	3.6	2.6	1.5
Bad debt charge/gross loans (%)	0.09	0.12	3.79	1.79	1.23
Loss reserves/assets (%)	0.00	0.00	0.00	0.00	0.00
Loss reserves/NPAs (%)	0.0	0.0	0.0	0.0	0.0
Tier 1 capital ratio (%)	-	-	-	-	-
Total capital ratio (%)	-	-	-	-	-

Per share

Reported EPS (INR)	22.41	22.81	20.98	39.18	56.01
Norm EPS (INR)	22.41	22.81	20.98	39.18	56.01
FD norm EPS (INR)	22.41	22.81	20.98	39.18	56.01
DPS (INR)	0.00	0.00	0.00	0.00	0.00
PPOP PS (INR)	39.89	48.06	57.44	69.80	89.76
BVPS (INR)	164.76	185.37	253.62	292.80	348.81
ABVPS (INR)	164.76	185.37	253.62	292.80	348.81
NTAPS (INR)	164.76	185.37	253.62	292.80	348.81

Valuations and ratios

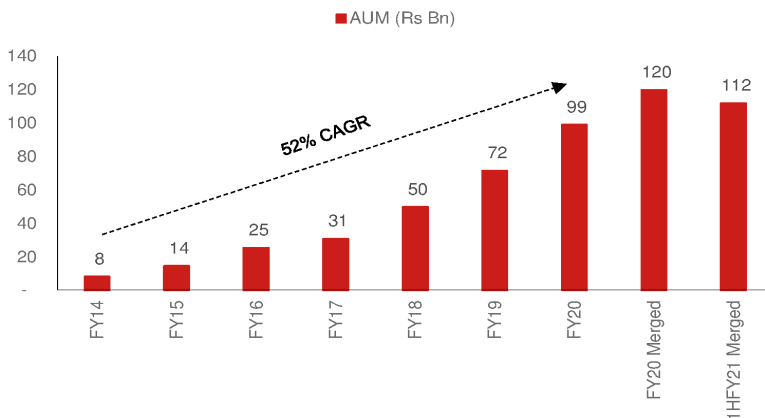
Reported P/E (x)	34.2	33.6	36.6	19.6	13.7
Normalised P/E (x)	34.2	33.6	36.6	19.6	13.7
FD normalised P/E (x)	34.2	33.6	36.6	19.6	13.7
Dividend yield (%)	-	-	-	-	-
Price/book (x)	4.7	4.1	3.0	2.6	2.2
Price/adjusted book (x)	4.7	4.1	3.0	2.6	2.2
Net interest margin (%)	-	13.24	13.82	13.08	13.21
Yield on assets (%)	-	20.50	21.96	20.31	20.28
Cost of int bearing liab (%)	-	9.03	9.70	8.80	8.70
Net interest spread (%)	-	11.48	12.25	11.51	11.58
Non-interest income (%)	7.5	6.0	3.4	2.6	2.5
Cost to income (%)	33.9	37.9	40.8	40.6	39.4
Effective tax rate (%)	35.4	27.4	25.2	25.2	25.2
Dividend payout (%)	0.0	0.0	0.0	0.0	0.0
ROE (%)	-	13.0	9.9	14.3	17.5
ROA (%)	-	3.51	2.56	3.79	4.47
Operating ROE (%)	-	17.9	13.3	19.2	23.3
Operating ROA (%)	-	4.83	3.43	5.07	5.98

Source: Company data, Nomura estimates

Largest and the best-placed NBFC-MFI

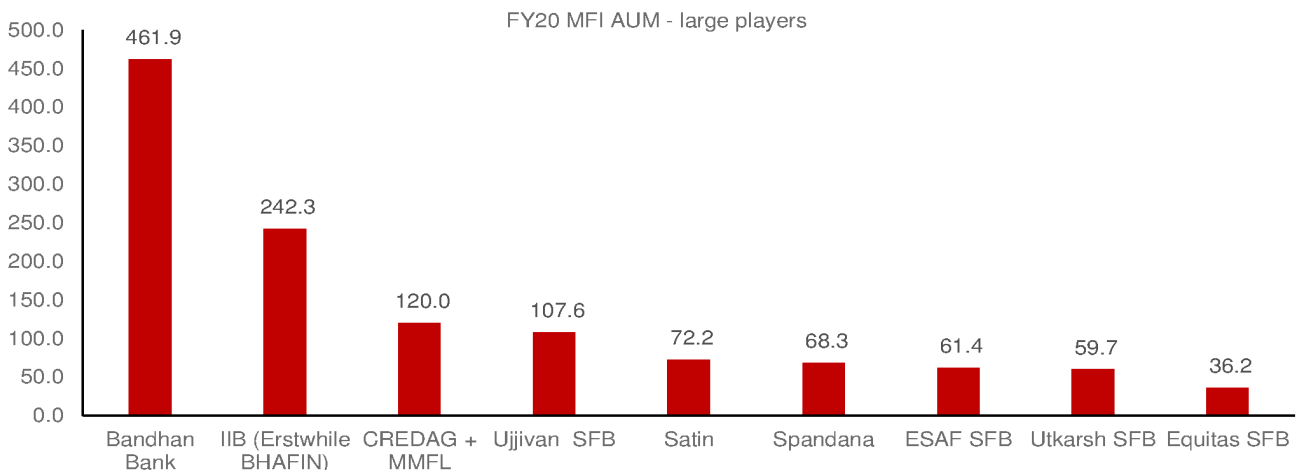
CRE DAG is the largest NBFC-MFI in India with consolidated AUM (including Madura) of INR112bn, implying an industry market share of >5% (16.3% within NBFC-MFI) and recorded a 52% AUM CAGR over FY14-20, with a strong presence in Karnataka, Maharashtra and Tamil Nadu. These states currently form 84% of the consolidated AUM and 81% of the borrower count for CRE DAG, while it has been making inroads into states like MP, Chhattisgarh and Odisha.

Fig. 99: CRE DAG has delivered a strong 52% AUM CAGR over FY14-20



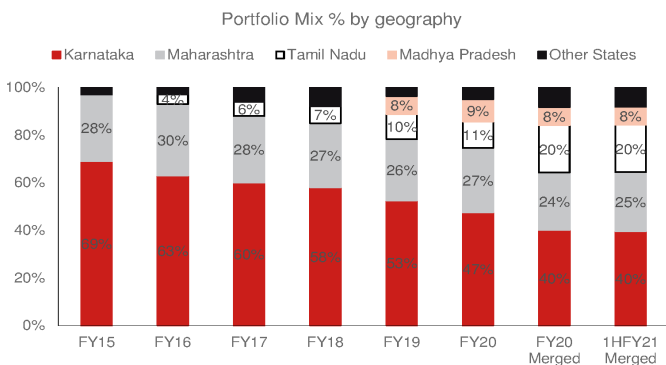
Source: Company data, Nomura research

Fig. 100: Top microfinance players by AUM INRbn



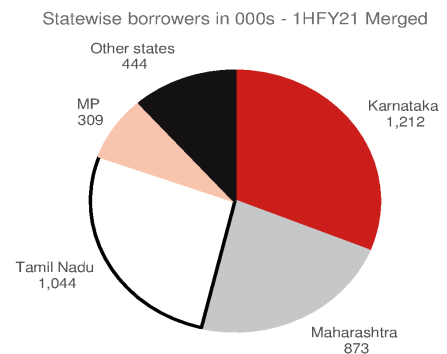
Source: Company data, Nomura research

Fig. 101: Portfolio mix by geography



Source: Company data, Nomura research

Fig. 102: State-wise borrowers in 000s - 1HFY21 Merged (4mn borrowers)



Source: Company data, Nomura research

Fig. 103: Strong market share gains for CREDAG over the past five years – >5% now

Top Player market share	AP crisis impact				Demonetisation impact				
	FY12	FY13	FY14	FY15	FY16	FY17	FY18	FY19	FY20
Bandhan	12.6%	14.4%	15.2%	16.3%	18.2%	19.9%	20.4%	21.5%	19.9%
Equitas	2.5%	3.7%	3.7%	3.7%	3.9%	3.1%	1.7%	1.7%	1.6%
Ujjivan	2.4%	3.5%	3.8%	5.0%	5.5%	5.0%	4.7%	5.2%	4.6%
SKS/ BHAFIN	5.7%	7.7%	7.8%	7.1%	9.1%	8.5%	9.3%	9.7%	10.5%
CREDAG	1.4%	1.9%	2.0%	2.5%	3.0%	2.9%	3.7%	4.0%	4.3%
Spandana	9.2%	3.8%	2.2%	2.0%	1.4%	1.2%	2.3%	2.4%	2.9%
Madura	0.5%	0.5%	0.6%	0.6%	0.6%	0.8%	0.9%	1.1%	0.9%
Satin	1.1%	1.9%	2.6%	3.7%	3.9%	3.4%	3.2%	3.6%	3.1%
ESAF	1.0%	1.4%	1.5%	1.7%	2.3%	2.5%	2.5%	2.7%	2.7%
Fincare (Disha + Future)	0.8%	0.8%	0.9%	1.1%	1.1%	1.1%	1.3%	1.6%	1.8%
Jana	1.2%	3.1%	5.1%	6.4%	13.0%	11.9%	4.3%	3.1%	3.0%
North East			0.3%	0.4%	0.6%	0.6%	0.8%	0.8%	0.6%
Suryoday	0.3%	0.5%	0.8%	1.0%	1.2%	0.8%	1.1%	1.2%	1.2%
Utkarsh	0.3%	0.6%	0.8%	1.2%	1.7%	1.5%	2.0%	2.3%	2.6%
Share	7.1%	3.1%	2.1%	1.1%					
Top 7	34.8%	36.7%	37.3%	40.2%	45.0%	44.0%	45.1%	48.1%	46.9%
All SFBs	8.3%	13.6%	16.9%	20.6%	29.3%	26.6%	18.4%	18.6%	18.1%
Top 3 NBFC-MFIs (incl BHAFIN)	8.1%	11.4%	12.4%	13.3%	15.9%	14.8%	16.1%	17.2%	17.8%

Source: Company data, Nomura research

Fig. 104: State-wise (top-3 states for CREDAG accounting for 84% of the consolidated AUM) market share

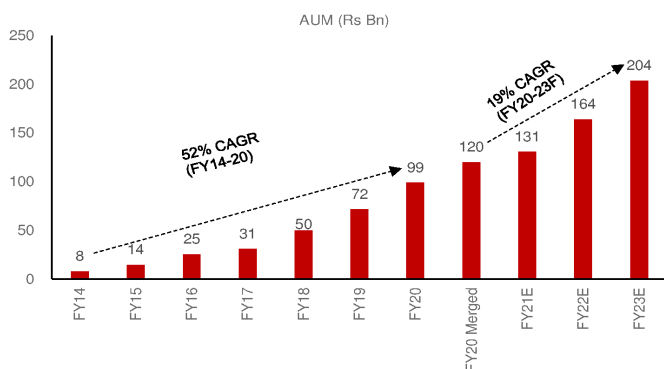
State wise Market Share %					
	FY16	FY17	FY18	FY19	FY20
Maharashtra					
Bandhan	4.8%	5.3%	6.0%	6.6%	6.0%
Equitas	5.4%	4.2%	2.5%	2.6%	2.6%
Ujjivan	8.6%	7.0%	7.1%	6.5%	7.2%
SKS	11.6%	10.0%	11.1%	11.3%	12.4%
CREDAG	9.4%	8.5%	11.9%	12.9%	15.9%
Spandana	2.1%	1.7%	3.8%	3.3%	4.8%
Top players	41.9%	36.8%	42.4%	43.3%	48.9%
Tamil Nadu					
Bandhan	0.8%	0.8%	1.0%	1.0%	1.1%
Ujjivan	6.3%	5.5%	5.6%	6.9%	6.8%
CREDAG	0.8%	1.1%	1.7%	2.7%	7.2%
Top players	24.4%	19.1%	14.5%	16.9%	21.0%
Karnataka					
Bandhan	1.9%	2.1%	2.0%	2.0%	2.3%
Equitas	2.8%	2.3%	1.3%	1.9%	1.9%
Ujjivan	11.6%	9.3%	8.2%	8.7%	11.1%
SKS	13.5%	10.7%	10.9%	12.0%	14.0%
CREDAG	19.8%	17.5%	22.2%	22.9%	24.6%
Spandana	2.9%	2.2%	5.5%	3.6%	4.4%
Top players	52.6%	44.1%	50.1%	51.1%	58.4%

Source: Company data, Nomura research

- CREDAG recorded 52% AUM CAGR over FY14-20, with 34% CAGR in borrowers and 13% growth in ticket size leading to significant market share gain from 1.5%-2.0% in FY12-13 to >5% now (including Madura). Its growth delivery has been driven by 32% CAGR expansion in branch network. More importantly, 68% of borrowers are with <three-year vintage (or customer stickiness), 42% borrowers are new to credit and 45% of branches are with <two-year vintage (>400 branches set up), providing CREDAG enough runway for growth. We also analyze the key operational metrics for state-wise branches which gives us some direction of the business potential for the new branches. Newly set up branches with a vintage of 0-18 months (~20-25%) could expand branch AUMs up to 6-8x over the next three-five years while 18-36 month vintage branches (30-35%) could grow AUMs by 1.5-2x the current size. CREDAG's growth has been primarily driven by its focus on the rural segment which has improved from 64% of AUMs in FY14 to 82% in FY20 (86% for the merged entity).

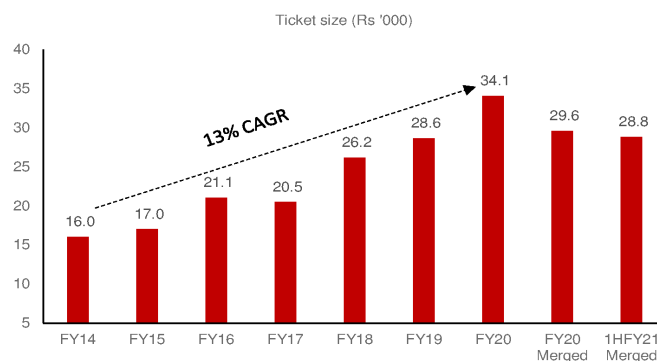
- We think CREDAG will be one of the key beneficiaries of the underlying trends with: (1) higher growth opportunity in the rural segment, (2) NBFC-MFIs gaining market share as banks/SFBs focus on diversifying their asset mix, and (3) acceleration in consolidation post COVID19-led crisis. With this, we expect CREDAG to record 19% CAGR in consolidated AUMs over FY20-23F. We expect growth to be further supported by: (1) improving customer vintage-led ticket size growth (68% of borrowers <three-year vintage), (2) improving branch productivity (~400 CREDAG branches set up over the past two years to mature), and (3) growth opportunity in new geographies (44% of incremental branches beyond top-3 states in the past three years).

Fig. 105: Strong 52% AUM CAGR over FY14-20...



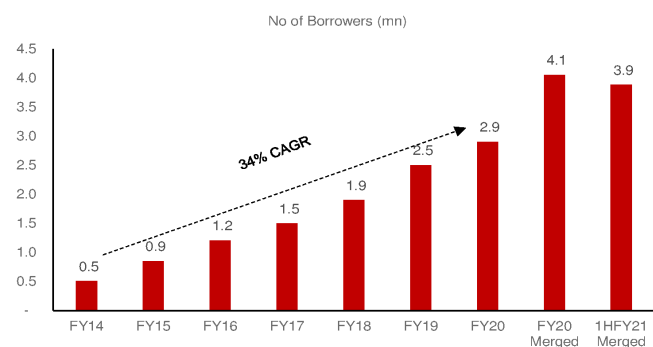
Source: Company data, Nomura estimates

Fig. 106: ...supported by 13% ticket size CAGR...



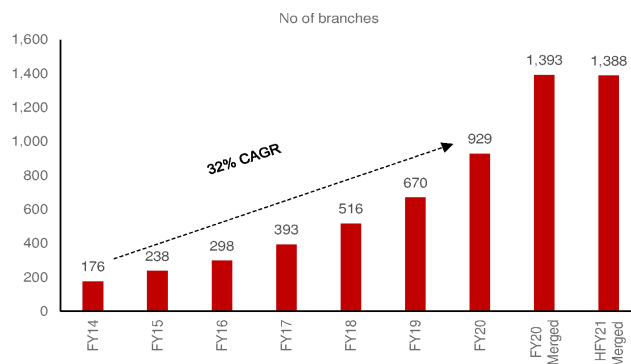
Source: Company data, Nomura research

Fig. 107: ...and a strong 34% CAGR in no. of borrowers



Source: Company data, Nomura research

Fig. 108: Branch network expansion at 32% CAGR has aided AUM growth



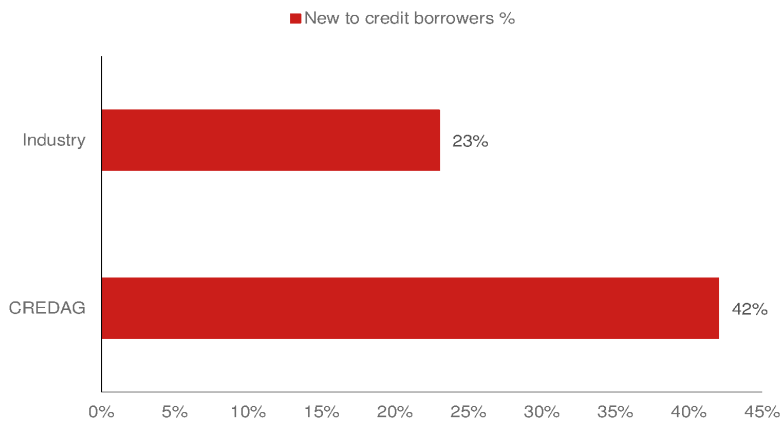
Source: Company data, Nomura research

Fig. 109: ~70% borrowers are <3 year old vintage

Borrower vintage	FY16	FY17	FY18	FY19	FY20
< 1 year	37%	27%	32%	33%	26%
1-3 years	42%	49%	37%	34%	42%
3-6 years	10%	15%	23%	25%	23%
6 years and above	10%	9%	8%	8%	9%
Borrower less than 3 year vintage	79%	76%	69%	67%	68%
Borrowers >3 year vintage	20%	24%	31%	33%	32%

Source: Company data, Nomura research

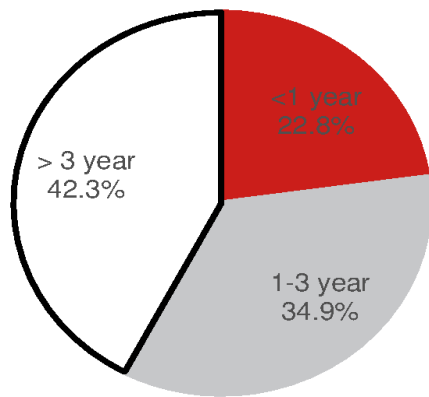
Fig. 110: New to credit customers at 42% – better growth potential



Source: Company data, Nomura research

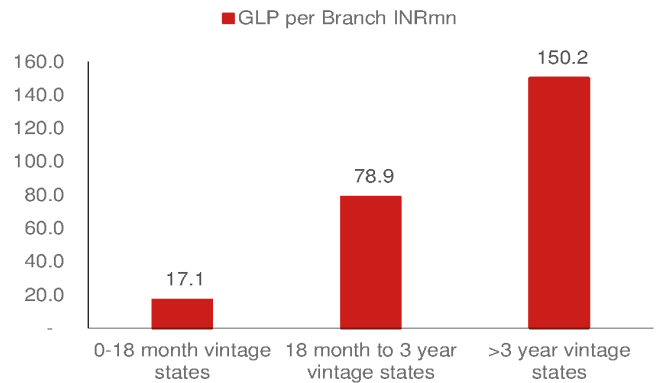
Fig. 111: 45% of branches are <2yr vintage – better growth potential

Branch vintage
Standalone branches: 929 (FY20)



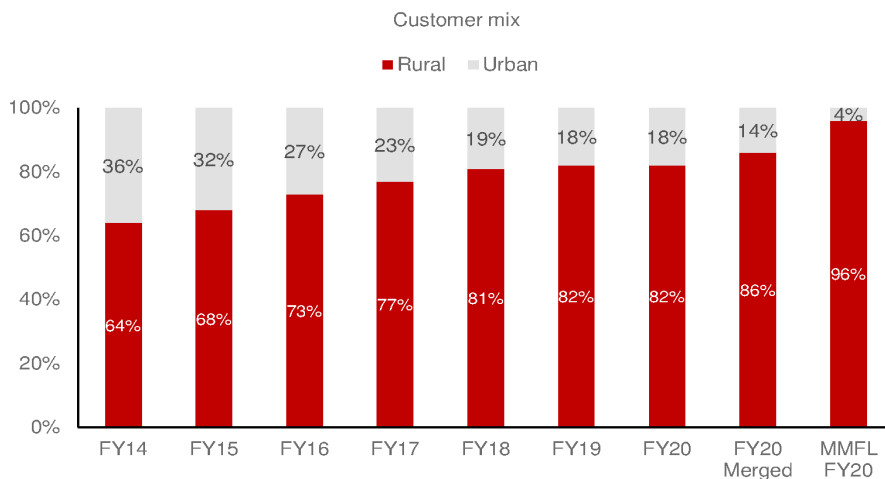
Source: Company data, Nomura estimates

Fig. 112: Branch productivity comparison by vintage



Source: Company data, Nomura estimates

Fig. 113: Rural focus has also aided growth for CREDAG

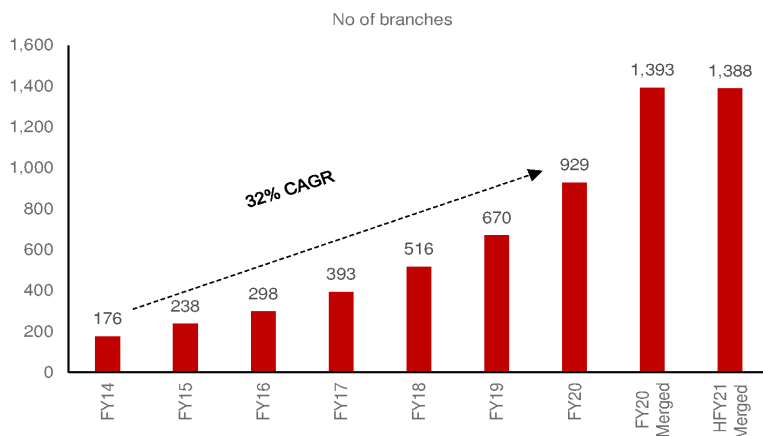


Source: Company data, Nomura research

Network expansion to provide further tailwinds

- CREDAG follows a contiguous expansion model and is very selective in entering new districts based on criteria like penetration, competitive landscape, bureau data, past asset quality experience, etc. While CREDAG is still concentrated in the top-3 states, 44% of incremental branch addition over the past three years has come from new geographies which will drive the necessary diversification, in our view. New geographies have contributed 18% of the incremental growth, recording 97% CAGR vs top-3 states recording 43% CAGR over FY17-20.

Fig. 114: Strong branch expansion over the past 2-3 years



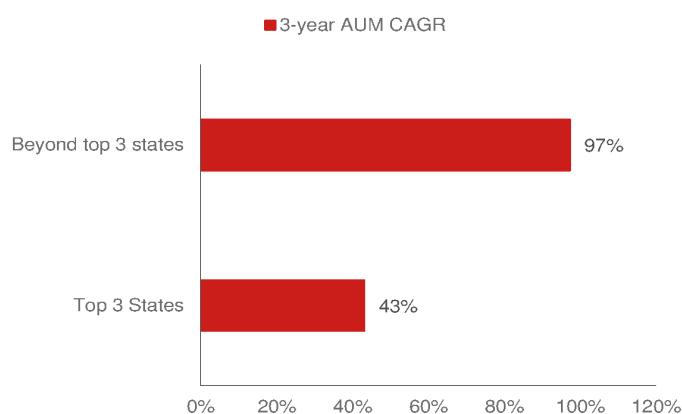
Source: Company data, Nomura research

Fig. 115: Incrementally branches have been opened beyond the top-3 states

State-wise branches (In nos)	FY14	FY15	FY16	FY17	FY18	FY19	FY20	1HFY21	Incremental			Incremental mix (%)		
									1yr	2yr	3yr	1yr	2yr	3yr
Karnataka	117	139	145	165	191	237	269	269	32	78	104	15.1%	18.9%	19.4%
Maharashtra	54	84	102	122	144	198	222	222	24	78	100	11.3%	18.9%	18.7%
Tamil Nadu	5	7	17	37	80	116	131	131	15	51	94	7.1%	12.3%	17.5%
MP	-	6	29	53	63	93	115	115	22	52	62	10.4%	12.6%	11.6%
Chattisgarh	-	2	5	16	25	25	41	41	16	16	25	7.5%	3.9%	4.7%
Rest of India	-	-	-	-	13	48	151	151	103	138	151	48.6%	33.4%	28.2%
Total	176	238	298	393	516	717	929	929	212	413	536			
Branches in Top 3 States (%)	100%	96.6%	88.6%	82.4%	80.4%	76.8%	67.0%	67.0%	33.5%	50.1%	55.6%			
Branches beyond top 3 states (%)	0%	3.4%	11.4%	17.6%	19.6%	23.2%	33.0%	33.0%	66.5%	49.9%	44.4%			

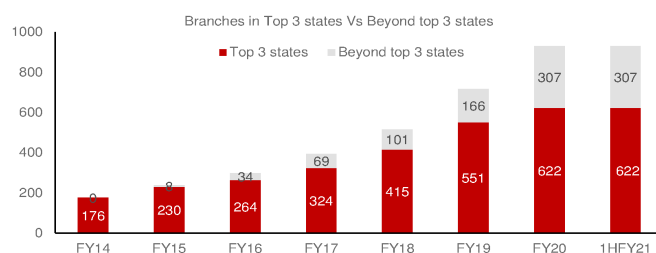
Source: Company data, Nomura research

Fig. 116: 3yr AUM CAGR – Top 3 states vs beyond top 3 states



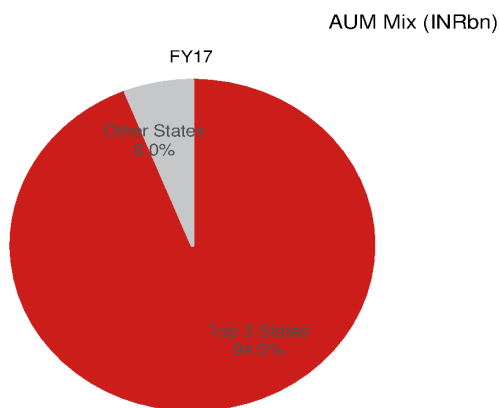
Source: Company data, Nomura research

Fig. 117: No. of branches: Top 3 states vs beyond top 3 states



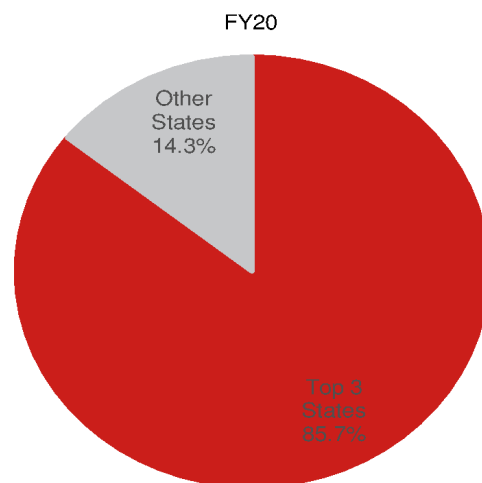
Source: Company data, Nomura research

Fig. 118: AUM concentration in Top-3 states has reduced from 94% as of FY17...



Source: Company data, Nomura research

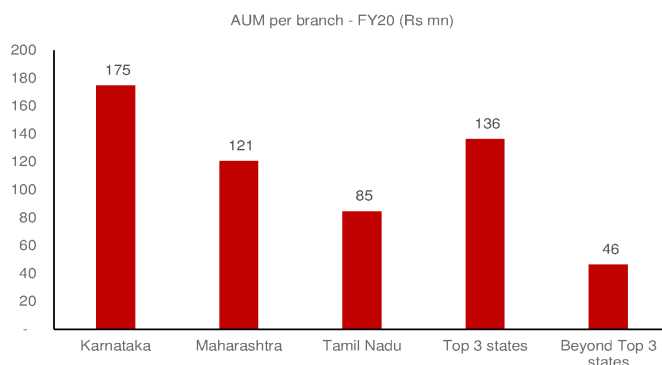
Fig. 119: ...to 85% as of FY20



Source: Company data, Nomura research

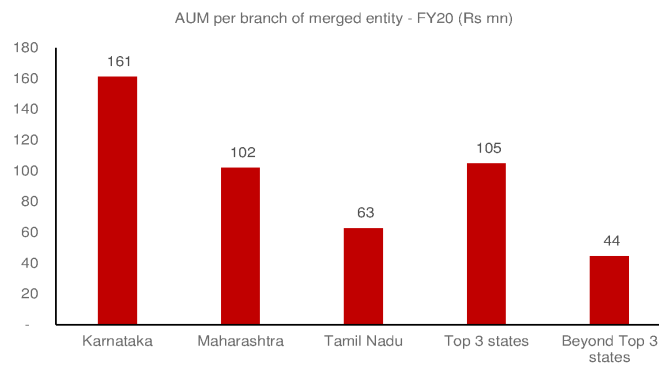
- We see tailwinds from new geographies where AUM/branch is meaningfully lower at INR46 vs INR136 of AUM/branch in top-3 states. As CREDAG continues to penetrate deeper in these new geographies and with branches maturing and borrower vintage improving, we think growth tailwind will remain strong for CREDAG over the medium-term.

Fig. 120: AUM per branch lower for newer states – should aid growth as scale improves



Source: Company data, Nomura research

Fig. 121: State-wise AUM per branch (merged entity)



Source: Company data, Nomura research

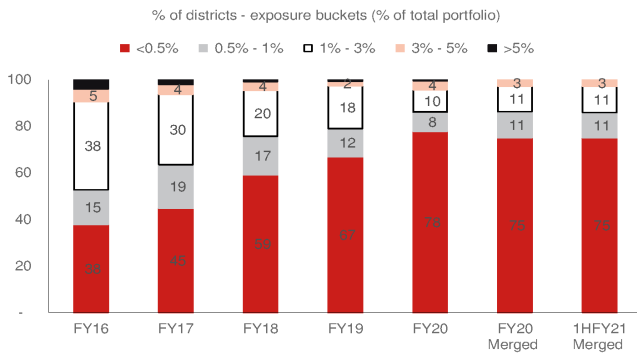
- Further, CREDAG has focused on minimizing concentration risks with diversification at a district level. While top-10 districts contribute only 24% of the consolidated AUM, CREDAG's portfolio is quite granular with >85% of districts having less than 1% AUM concentration.

Fig. 122: District level concentration low for CREDAG with +75% of AUM coming from below Top-10 states

District level portfolio concentration (In %)	FY16	FY17	FY18	FY19	FY20	FY20 Merged	1HFY21 Merged
Top 1	6	6	6	5	4	4	3
Top 3	17	15	15	13	12	10	9
Top 5	26	23	22	20	17	15	14
Top 10	41	37	36	32	29	24	24
Other (below Top-10)	59	63	64	68	71	76	76

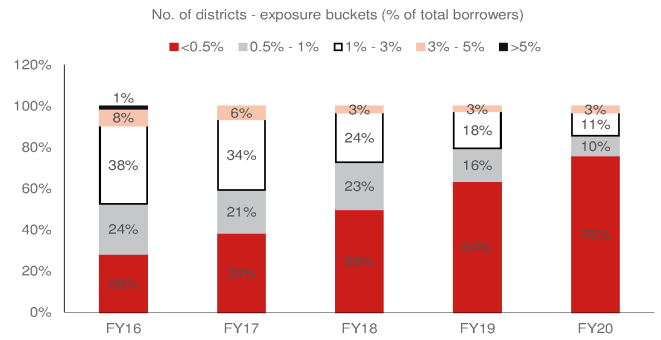
Source: Company data, Nomura research

Fig. 123: AUM concentration by districts



Source: Company data, Nomura research

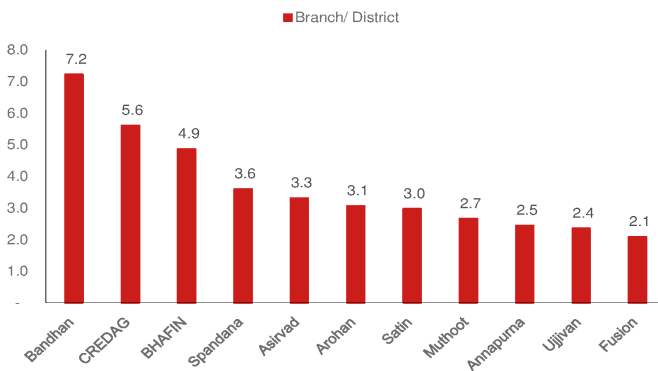
Fig. 124: Borrower concentration by districts



Source: Company data, Nomura research

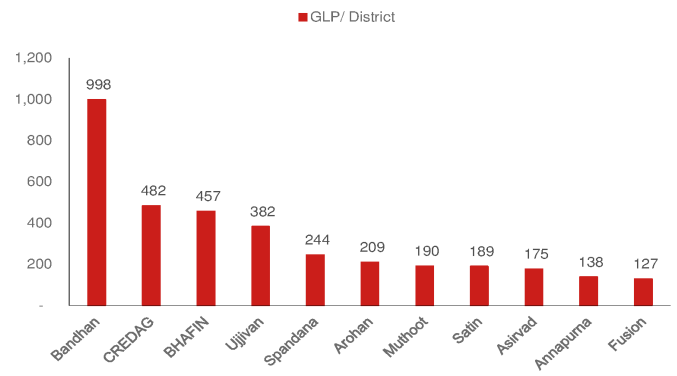
- CREDAG's number of branches / district is also high at 5.6/district compared to other players at 2-3 branches/ district, leading to higher gross loan portfolio (GLP) / district at ~INR480mn vs peers at ~INR200-250mn.

Fig. 125: CREDAG has higher branches per district vs peers...



Source: Company data, Nomura research

Fig. 126: ...leading to better GLP per district



Source: Company data, Nomura research

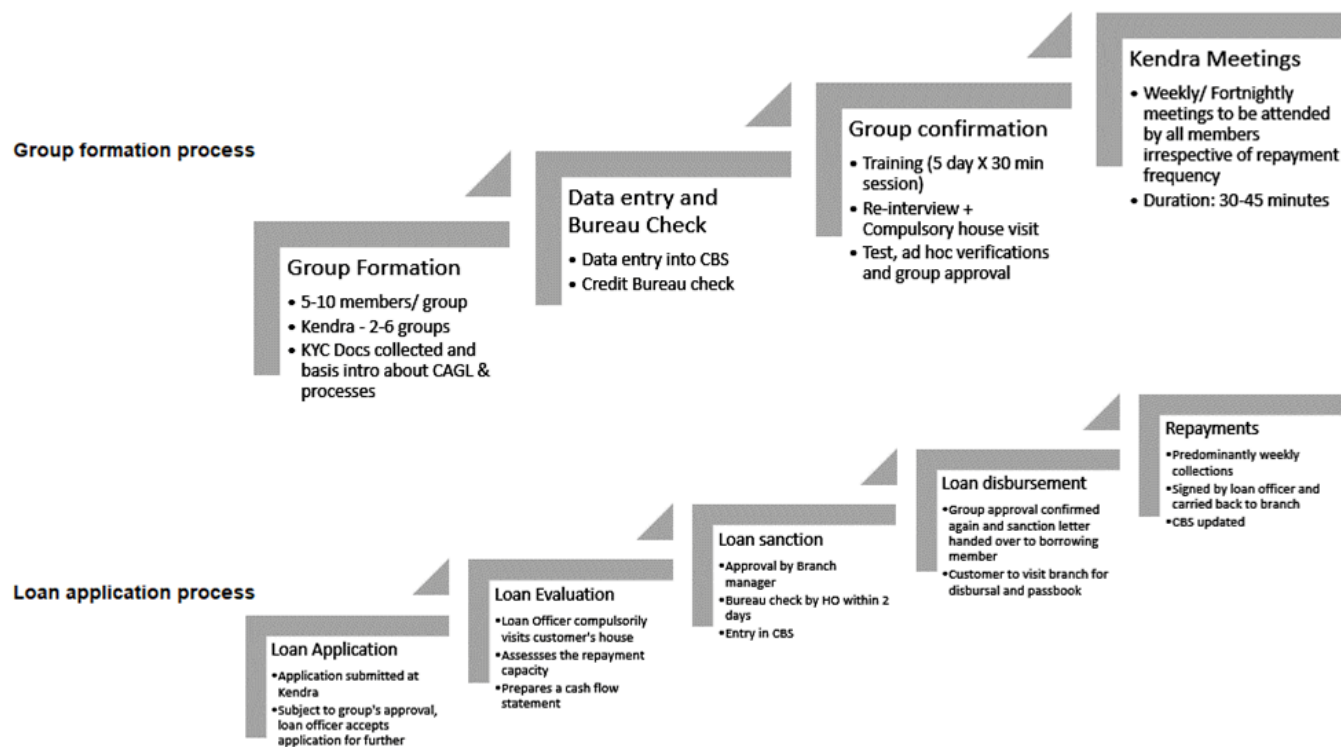
Tailor-made approach

- One of the most important success factors, in our view, for CREDAG is its tailor-made customized approach to cater to its customers and the company does not follow a one-size-fits-all approach.
- This has enabled CREDAG to capture market potential by enhancing the customer proposition in a much better fashion without diluting its operational and underwriting discipline.
- Customized offering has led to best-in-class customer retention, higher credit need fulfilment for customers and better monetization of life cycle value of a customer.

Superior product proposition – retail loans to support sustainable growth:

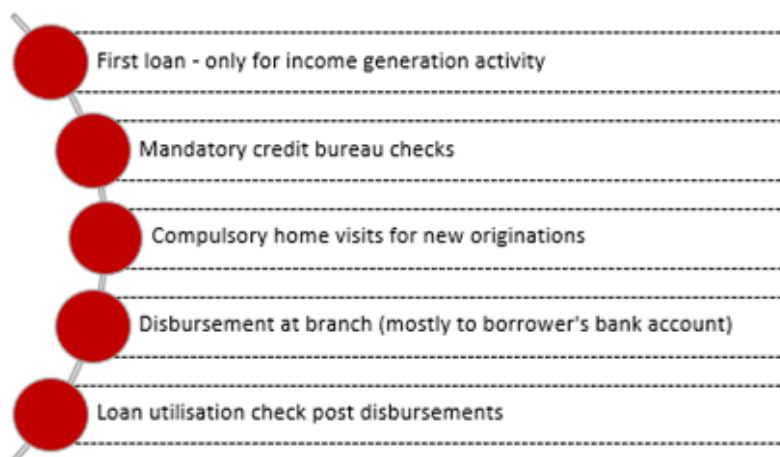
- CREDAG does capture the life cycle of a borrower much better than its peers by offering multiple products to its microfinance customers, ranging from pure MFI loans, home improvement loans, education loans, family welfare loans, etc. It sets limits per borrowers based on existing leverage and income profile for each borrower and offers a much more customized loan size, loan tenure and repayment frequency for each borrower (even in the same group).

Fig. 127: Brief Joint liability group (JLG) based lending process



Source: Company data, Nomura research

Fig. 128: Checks and balances



Source: Company data, Nomura research

- It also offers retail loans by moving its existing MFI customers (who have completed > three years with CREDAG) outside of the JLG model. While this forms >5% of the AUMs currently, it only forms 3% of its customer base. We see individual loans to be a large growth opportunity for the next decade with ~9% customers with >6-year vintage. Over the next decade, we see a INR1.5-3tn opportunity in this segment by FY25F/30F– CREDAG has 32% of its 2.9mn borrowers with a vintage of >3-year currently and looks well-placed to leverage this opportunity.

Fig. 129: Individual lending opportunity – 32% borrowers with >3y ear vintage

Borrower vintage	FY16	FY17	FY18	FY19	FY20
< 1 year	37%	27%	32%	33%	26%
1-3 years	42%	49%	37%	34%	42%
3-6 years	10%	15%	23%	25%	23%
6 years and above	10%	9%	8%	8%	9%
Borrower less than 3 year vintage	79%	76%	69%	67%	68%
Borrowers >3 year vintage	20%	24%	31%	33%	32%

Source: Company data, Nomura research

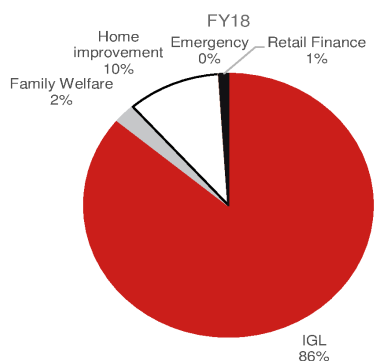
- While group loans still form 95% of AUMs, its retail loans have grown at a much faster pace of 213% CAGR over the past two years vs MFI group loans which have recorded 38% CAGR. We expect retail loans to grow faster at 45% CAGR over FY21-23F once the merger with Madura materializes vs. an overall loan growth of 25% and group loan growth at 24%.

Fig. 130: Product suite

Loan Type	Product	Purpose	Ticket Size (INR)	Tenure (months)	AUM FY20 INRmn	Aum Mix (%)	FY18-20 CAGR
Group	Income Generation Loan(IGL)	Business Investments and Income Enhancement activities	INR5,000 - INR80,000	12-24 mths	84,473	85.4%	40.4%
	Home Improvement Loans	Water Connections, Sanitation and Home Improvement & Extensions	INR5,000 - INR50,000	12-48 mths	7,696	7.8%	21.7%
	Family Welfare Loans	Festival, Medical, Education and Livelihood Improvement	INR1,000 - INR15,000	3-12 mths	1,678	1.7%	19.7%
	Special Situation Loans	Emergencies	INR2,000	6 mths	-	-	-
	Emergency Loans	Emergencies	INR1,000	3 mths	125	0.1%	138.4%
Individual	Retail Finance Loans	Purchase of inventory, machine, assets or for making capital investment in business or business expansion	Up to INR5,00,000	6-60 mths	4,991	5.0%	211.9%

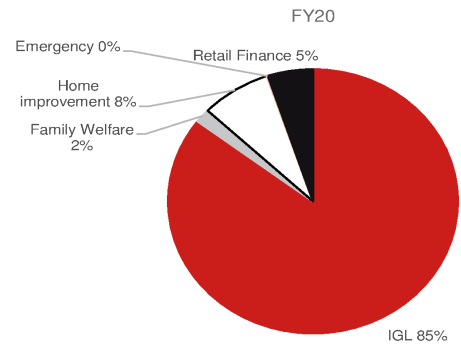
Source: Company data, Nomura research

Fig. 131: Product mix – FY18



Source: Company data, Nomura research

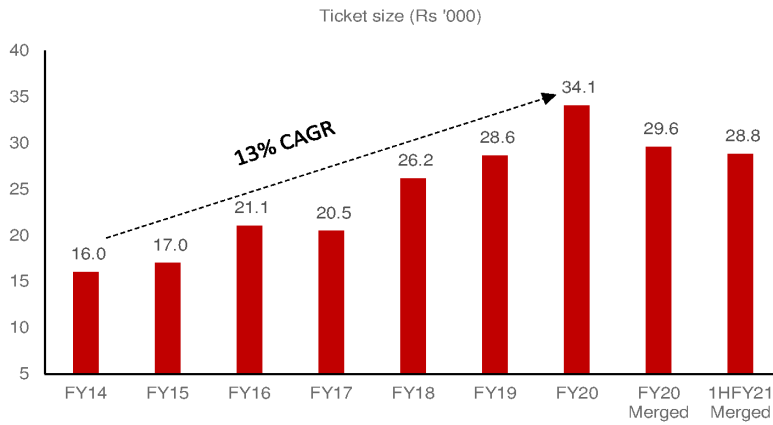
Fig. 132: Product mix – FY20



Source: Company data, Nomura research

- Further, CREDAG offers these loans on a need-basis (within overall sanction limit) and not restricted on the basis of the loan cycle for the group. With a diversified loan offering, CREDAG has been able to maintain a much better average loans outstanding per borrower as compared to its peers despite similar/ lower disbursement ticket size, thereby monetizing its customer life cycle much better than peers and also improving customer retention.

Fig. 133: Average loans per customer higher for CREDAG vs peers due to more customized offering

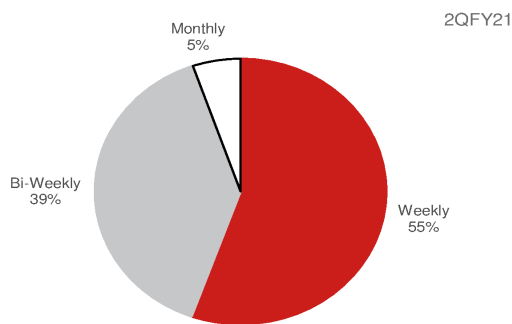


Source: Company data, Nomura research

Flexible repayment – a much more customer-focused approach:

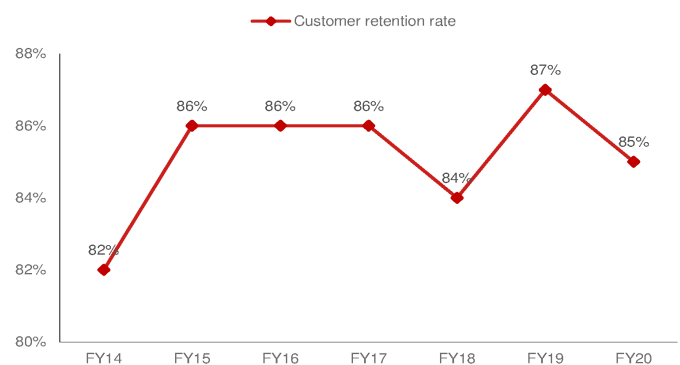
- With most MFIs focusing on maximizing profitability through cost efficiencies, we see customer needs getting ignored and ultimately also not leading to any sustainable cost benefit for MFI players.
- CREDAG follows a multi frequency collection model with 55% weekly, 39% fortnightly and 5% monthly collection, based on its customer cashflow and convenience rather than just focusing on cost optimization. That said, CREDAG does conduct weekly centre meetings which ensure a much better connectivity and connect with its customers even if they are on a monthly/fortnightly repayment frequency.
- This customer-focused, tailor-made solutions have helped CREDAG to maintain a much higher customer retention rate at 85% vs industry average of 78% (as of Sep-17) and capture the lifecycle of borrowers much better than peers. This has also helped CREDAG deliver well on asset quality in the past cycles.

Fig. 134: CREDAG offers re-payment flexibility to customers



Source: Company data, Nomura research

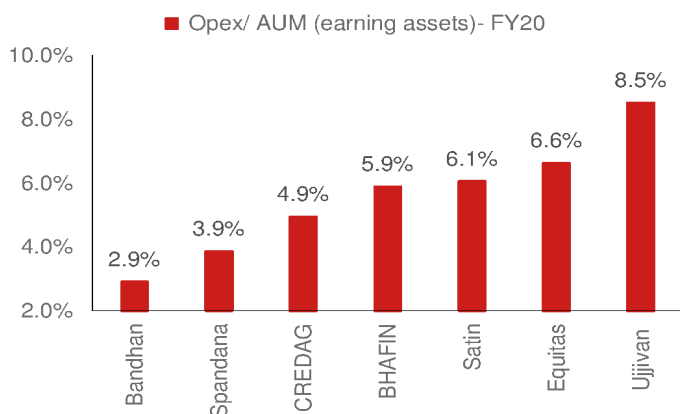
Fig. 135: More customized offerings lead to better customer retention



Source: Company data, Nomura research

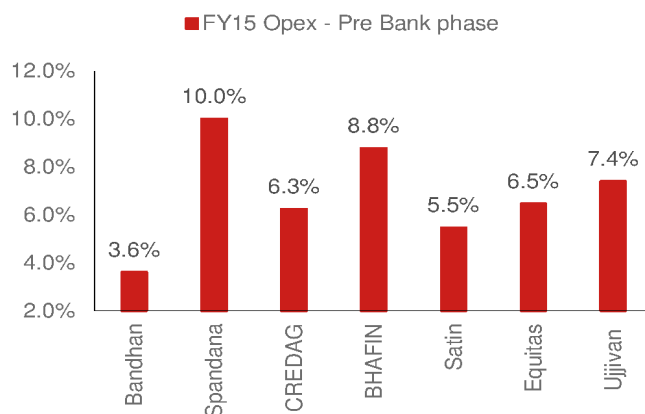
- More importantly, despite its focus on the rural segment (82% of AUMs) and weekly collection model (55% of AUMs), we have not seen a meaningful gap in cost efficiencies with opex/AUMs at 6.3% (FY15) vs 6.5-7.4% (FY15 – pre-bank phase) for small finance banks (SFBs) with monthly collection model and also at 4.9% (FY20) vs peers like Satin/BHAFIN with opex/AUMs of 6.1% (FY20)/ 5.9% (FY19), respectively.

Fig. 136: Opex / AUM – FY20



Note: BHAFIN data for FY19
Source: Company data, Nomura research

Fig. 137: Opex / AUM – FY15

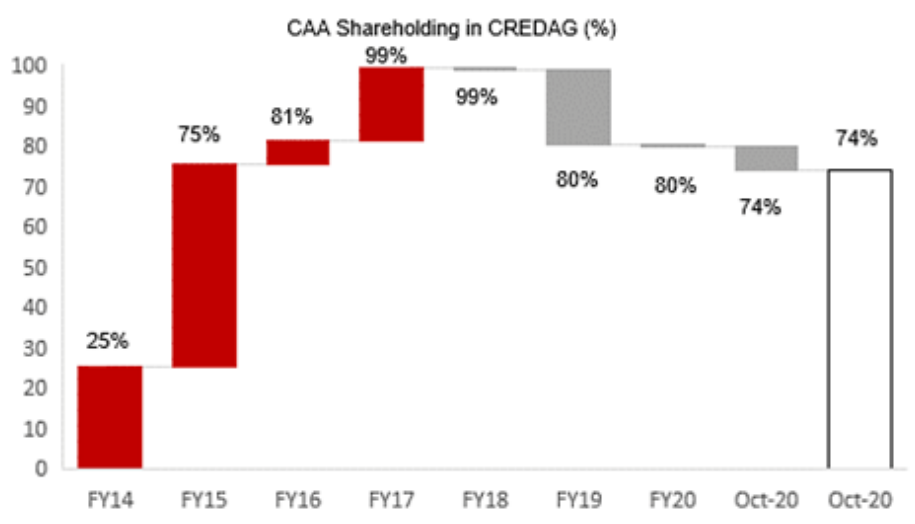


Source: Company data, Nomura research

Strong parentage – funding constraints meaningfully lower

- CREDAG is promoted by “Credit Access Asia” which is a professionally managed company and specializes in micro financing. It has its operations in India – through CREDAG (since 2010), the Philippines – through Credit Access – Philippines (since 2014), Indonesia – through PT Bina Artha Ventura (since 2012) and Vietnam through CreditAccess Vietnam. CAA is focused on the MFI sector across Asia with India contributing 91% of AUMs (FY19) for them.
- Its investor base includes Olympus Capital Asia (US PE firm, focusing on mid-cap Asian companies), holding 17% and Asian Development Bank holding 9%. The initial shareholders were a large group of family offices and HNIs, and still represent around 50% of the share capital.
- While we think funding remains one of the key risks in the sector and converting into a bank does help in mitigating this risks meaningfully, having such a strong promoter backing does address large part of our concern on the longer term funding challenges as well.
- Unlike a PE investor with a specific time horizon, CAA acts as a promoter which ensures CREDAG to deliver longer term sustainable business in a disciplined way. It further supports CREDAG in both equity and debt needs in times of stress and opens up opportunity to tap foreign funding.
- Such strong promoter backing has helped in the past when CAA invested €20.5mn via equity and €20.5mn via Compulsory Convertible Debenture into CREDAG during demonetization period which helped CREDAG navigate the cycle without any funding challenges.

Fig. 138: CAA shareholding in CREDAG



Source: Company data, Nomura research

Well-diversified funding avenues and well-matched ALM

- MFIs have a relatively shorter tenure loan book (12-24 months) and thus usually have a well-matched ALM compared to longer-duration lenders like mortgage, vehicle, etc. CREDAG focuses on a diversified funding profile, both in terms of duration and funding source. CREDAG also aims at leveraging its strong parentage in raising money from foreign sources. CREDAG's liabilities are well diversified on duration basis with 21% of the liabilities having >3-year duration, 63% having 1-3 year duration and 16% <1 year as of 2QFY21. Funding sources are also quite diversified with banks contributing 61%, financial institutions and NBFCs contributing ~24%, 10% from foreign sources and 6% by means of assignment.

Operationally most prudent – sticking to basics

- We see operational discipline to be the single-most critical metric on which MFIs need to be evaluated and remains one of the key determinant in making a strong and a sustainable business model. With growth opportunity being abundant, we have seen failures in the MFI space driven by operational lapses either by chasing growth aggressively, lack of confidence in the business or poor customer connect.
- We see CREDAG ticking most of the right boxes here with: (1) calibrated expansion without diluting its market understanding and strength, (2) relentless focus on maintaining strong customer connect, (3) customer-centric approach, (4) prudent underwriting practices and superior risk management framework, and (5) alignment of employee interests.

Calibrated expansion without diluting its market understanding and strength

- CREDAG follows a calibrated network expansion strategy, expanding into neighboring geographies which ensures a much better market understanding, availability of human capital and better connect with its customers.
- CREDAG has expanded its branch network by 32% CAGR over FY14-20 with a borrower CAGR of 34% and has been able to reduce its concentration risks from 94% contribution from top-3 states to 85% now and further to 84% with the merger of Madura. With Madura acquisition and 44% of incremental branches opened in new geographies over the past three years, we think concentration risks will dilute further over the medium term as new branches mature.
- Further, as discussed earlier, we think there is some merit in maintaining some concentration as well which CREDAG rightfully balances well by diversifying its district exposures.

Fig. 139: Incrementally new branch additions have been beyond top-3 states

State-wise branches (In nos)	FY14	FY15	FY16	FY17	FY18	FY19	FY20	1HFY21	Incremental			Incremental mix (%)		
									1yr	2yr	3yr	1yr	2yr	3yr
Karnataka	117	139	145	165	191	237	269	269	32	78	104	15.1%	18.9%	19.4%
Maharashtra	54	84	102	122	144	198	222	222	24	78	100	11.3%	18.9%	18.7%
Tamil Nadu	5	7	17	37	80	116	131	131	15	51	94	7.1%	12.3%	17.5%
MP	-	6	29	53	63	93	115	115	22	52	62	10.4%	12.6%	11.6%
Chattisgarh	-	2	5	16	25	25	41	41	16	16	25	7.5%	3.9%	4.7%
Rest of India	-	-	-	-	13	48	151	151	103	138	151	48.6%	33.4%	28.2%
Total	176	238	298	393	516	717	929	929	212	413	536			
Branches in Top 3 States (%)	100%	96.6%	88.6%	82.4%	80.4%	76.8%	67.0%	67.0%	33.5%	50.1%	55.6%			
Branches beyond top 3 states (%)	0%	3.4%	11.4%	17.6%	19.6%	23.2%	33.0%	33.0%	66.5%	49.9%	44.4%			

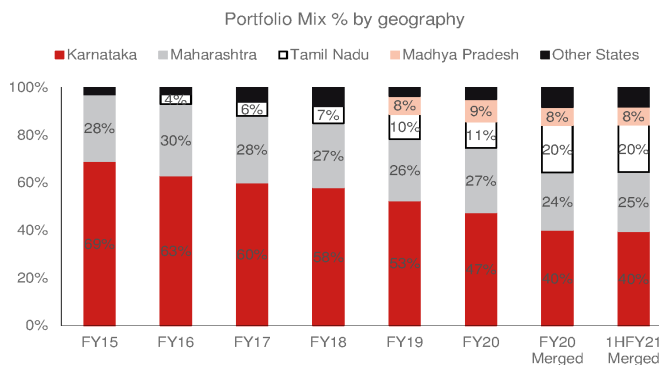
Source: Company data, Nomura research

Fig. 140: Beyond top-3 states , the mix of AUM has increased from 6% to 16% over FY17-20

Portfolio by states (INRmn)	FY15	FY16	FY17	FY18	FY19	FY20	FY20	1HFY21	Incremental		Growth	
									FY15-20	FY17-20	FY15-20	FY17-20
Karnataka	10,067	16,073	18,303	28,892	37,624	46,973	48,020	44,280	36,906	28,670	36.1%	36.9%
Maharashtra	4,008	7,540	8,760	13,296	18,451	26,761	28,970	27,720	22,753	18,001	46.2%	45.1%
Tamil Nadu	395	925	1,924	3,389	7,465	11,070	23,890	22,200	10,675	9,146	94.8%	79.2%
Rest of India	-	762	1,845	3,980	7,875	14,156	19,080	17,630	14,156	12,311		97.2%
Total	14,470	25,300	30,832	49,557	71,415	98,960	1,19,960	1,11,830	84,490	68,128	46.9%	47.5%
Aum mix by state (%)												
Karnataka	69.6%	63.5%	59.4%	58.3%	52.7%	47.5%	40.0%	39.6%	43.7%	42.1%		
Maharashtra	27.7%	29.8%	28.4%	26.8%	25.8%	27.0%	24.1%	24.8%	26.9%	26.4%		
Tamil Nadu	2.7%	3.7%	6.2%	6.8%	10.5%	11.2%	19.9%	19.9%	12.6%	13.4%		
Rest of India	0.0%	3.0%	6.0%	8.0%	11.0%	14.3%	15.9%	15.8%	16.8%	18.1%		
AUM												
Top 3 States	14,470	24,538	28,987	45,577	63,540	84,804	1,00,880	94,200	70,334	55,817	42.4%	43.0%
Other States	-	762	1,845	3,980	7,875	14,156	19,080	17,630	14,156	12,311	107.6%	97.2%

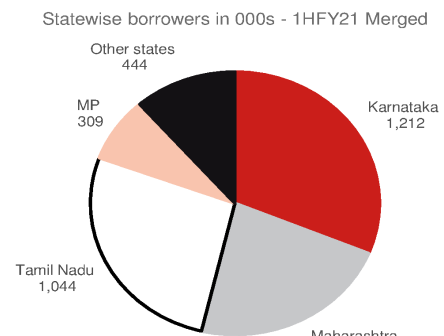
Source: Company data, Nomura research

Fig. 141: Portfolio mix by geography



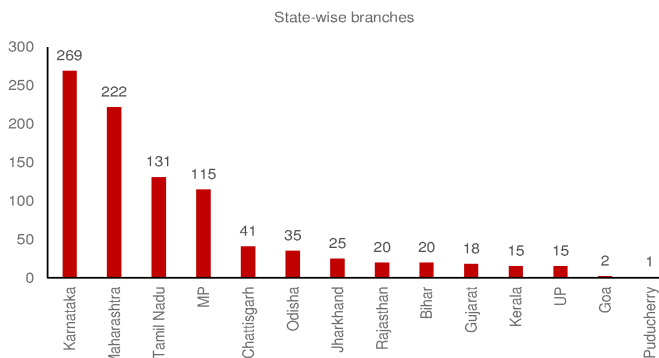
Source: Company data, Nomura research

Fig. 142: Borrower mix by states



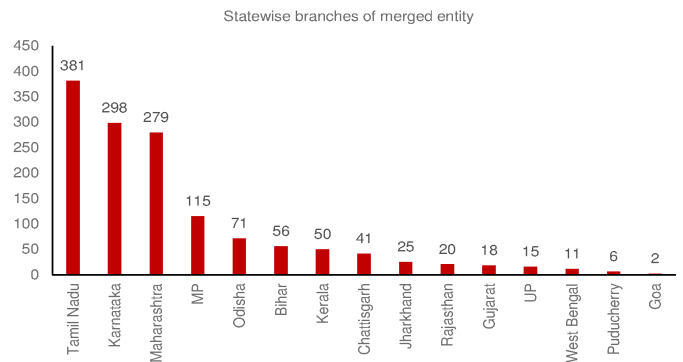
Source: Company data, Nomura research

Fig. 143: State-wise branches (1HFY21)



Source: Company data, Nomura research

Fig. 144: State-wise branches of merged entity (1HFY21)



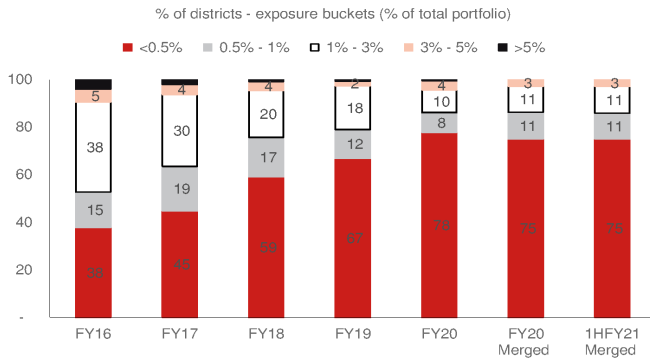
Source: Company data, Nomura research

Fig. 145: District -level concentration low for CREDAAG with +75% of AUM coming from below Top-10 states

District level portfolio concentration (In %)	FY16	FY17	FY18	FY19	FY20	FY20 Merged	1HFY21 Merged
Top 1	6	6	6	5	4	4	3
Top 3	17	15	15	13	12	10	9
Top 5	26	23	22	20	17	15	14
Top 10	41	37	36	32	29	24	24
Other (below Top-10)	59	63	64	68	71	76	76

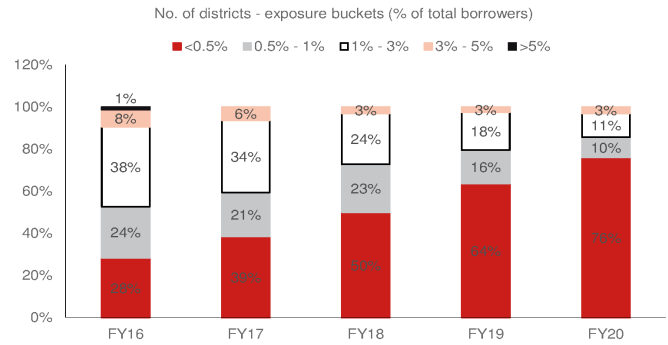
Source: Company data, Nomura research

Fig. 146: AUM concentration by districts



Source: Company data, Nomura research

Fig. 147: Borrower concentration by districts

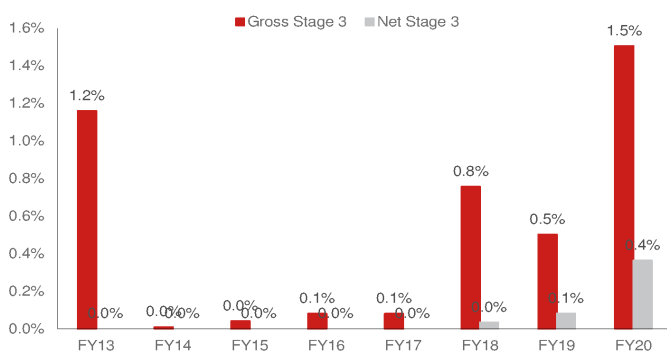


Source: Company data, Nomura research

Strong focus on maintaining solid customer connect

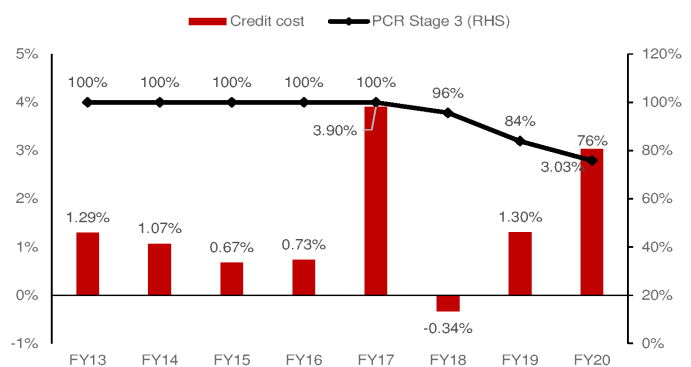
- CREDAAG does provide flexibility in repayment options to suite its customer needs while irrespective of payment frequency, it conducts its centre meetings on a weekly basis. This not only aids in developing and maintaining better customer connect but also helps in delivering better asset quality. While this does increase costs for CREDAAG, it also helps in lowering through-cycle credit costs. CREDAAG has consistently delivered lower credit costs vs the industry. This superior performance has been maintained even during events like demonetization and even for the impacted districts.

Fig. 148: Strong asset quality trends...



Note: Stage 3 is 60+dpd starting FY19
Source: Company data, Nomura research

Fig. 149: ...leading to lower credit cost



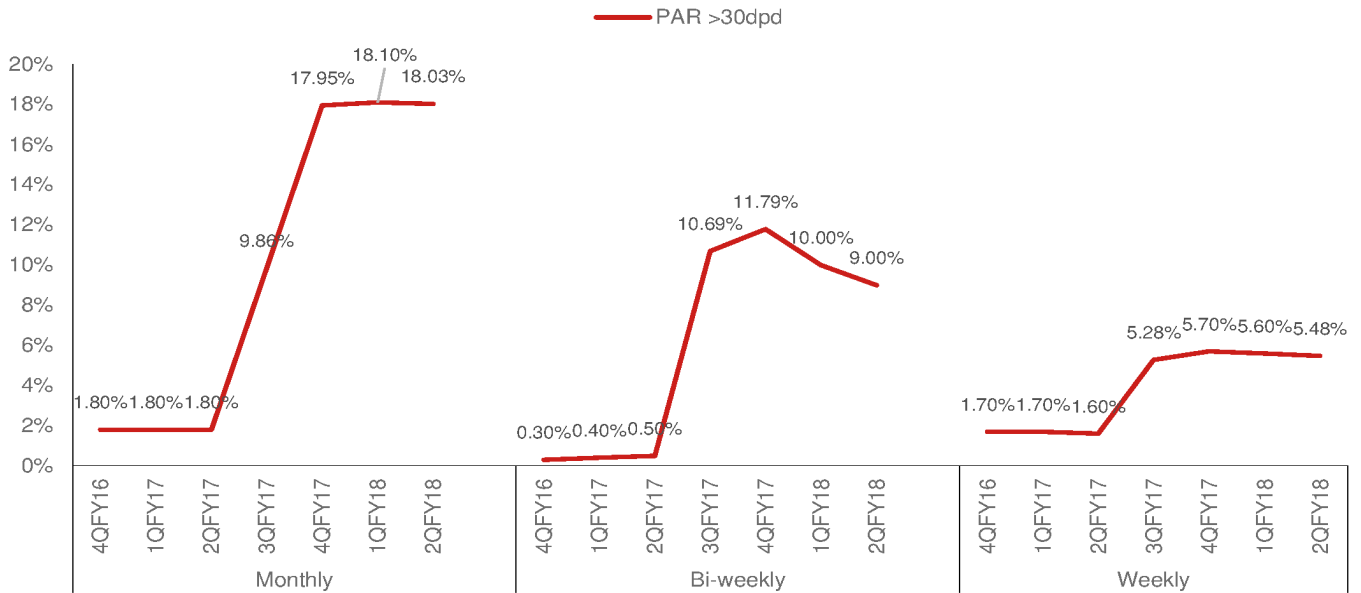
Source: Company data, Nomura research

Fig. 150: CREDAG has consistently delivered lower credit cost vs peers

Credit cost %	FY12	FY13	FY14	FY15	FY16	FY17	FY18	FY19	FY20
Credit Access	-0.6%	1.3%	1.1%	0.7%	0.7%	3.9%	-0.3%	1.3%	3.0%
Spandana		68.1%	0.5%	0.5%	0.9%	3.3%	1.7%	1.2%	4.9%
BHAFIN	52.1%	20.1%	0.9%	0.4%	1.0%	5.9%	1.1%	0.8%	
Satin	0.3%	0.5%	1.1%	0.6%	0.6%	1.5%	1.0%	0.9%	2.8%
Bandhan						0.5%	1.4%	2.2%	2.6%
Ujjivan	0.9%	0.8%	0.6%	0.9%	0.6%	1.3%	4.5%	0.4%	1.4%
Equitas	0.8%	0.8%	0.9%	1.6%	1.2%	1.6%	2.2%	0.9%	1.8%
Top 7 MFI lenders - credit cost	13.5%	17.9%	0.9%	0.8%	0.9%	2.0%	1.6%	1.4%	2.5%

Source: Company data, Nomura research

Fig. 151: Weekly collection model has had superior asset quality outcomes



Source: Company data, Nomura research

Customer-centric approach

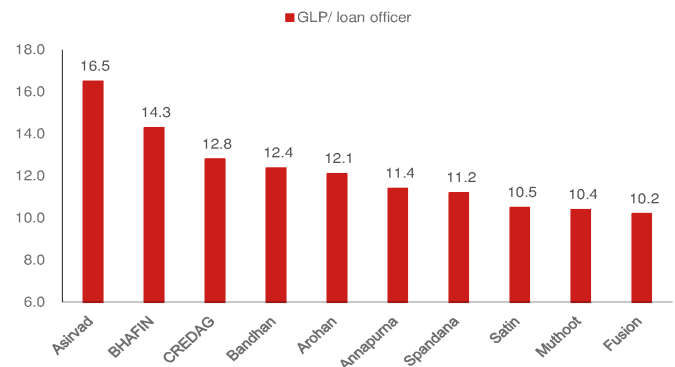
- CREDAG’s uniqueness comes from its customer-centric approach where it has found a fine balance by placing customer needs at the centre (flexible repayment options, multiple product offering and flexible loan offerings) while not diluting its operational standards, risk management practices and ensuring a favourable work environment for its employees. This has helped CREDAG to achieve better productivity despite higher operational costs while maintaining better asset quality. While CREDAG does operate at a much lower borrower per loan officer ratio vs peers due to the weekly collection model, its opex/AUM has been comparable or better than peers due to better customer and employee retention, better AUM outstanding per customer and lower employee cost.

Fig. 152: Borrowers / loan officer lower for CREDAG due to the high touch model



Source: Company data, Nomura research

Fig. 153: More flexible offerings still lead to higher AUM/ loan officer

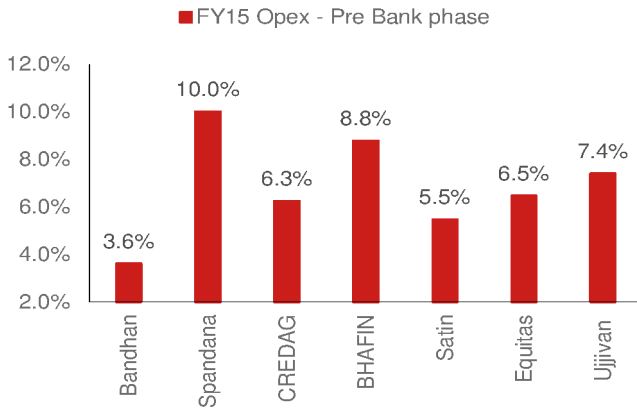


Source: Company data, Nomura research

Operational efficiency without diluting operational standards - benchmarking CRETAG

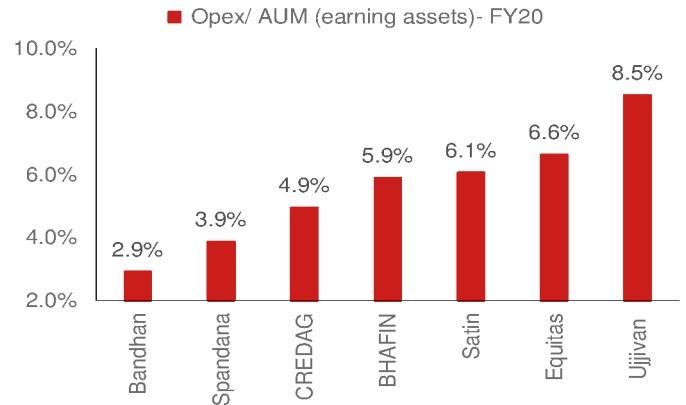
- With spreads capped at 10% levels and lower pricing sensitivity in the MFI segment, we highlight two most relevant factors to compare MFIs: 1) its trough cycle asset quality performance (explained earlier), and 2) operating efficiency, which remains the key determinant of a superior ROA/ROE delivery.
- On operational metrics as well, CRETAG does compare well vs its peers despite its tighter operating standards.

Fig. 154: Opex ratio comparison – pre - bank phase



Source: Company data, Nomura research

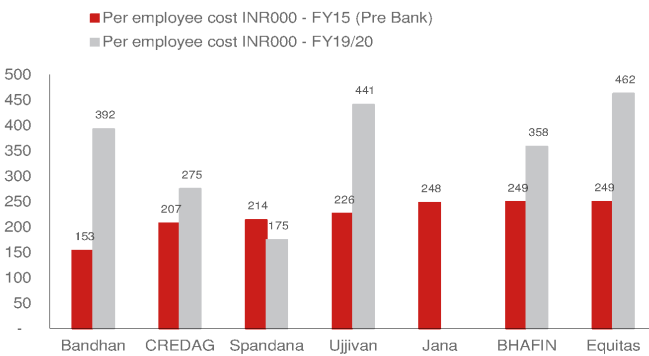
Fig. 155: Better employee and customer retention leads to lower/ similar opex/AUM vs . peers



Source: Company data, Nomura research

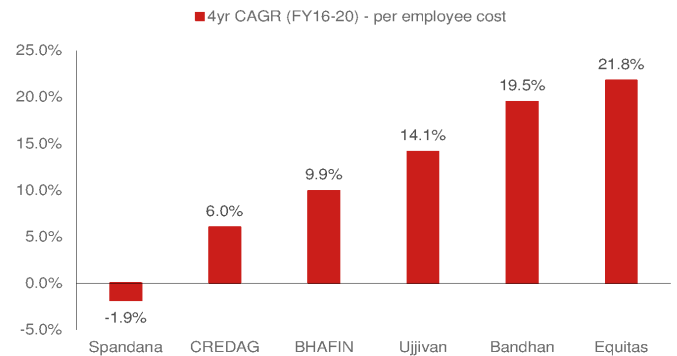
- **Best-in-class employee cost and employee retention** – CRETAG enjoys the lowest cost per employee amongst its peers, and has increased at 6% over the past four years. Bandhan, Equitas and Ujjivan have seen spikes in employee costs due to talent acquisitions after converting into bank/SFB.

Fig. 156: Per employee cost among the lowest for CRETAG



Source: MFIN, Company data, Nomura research

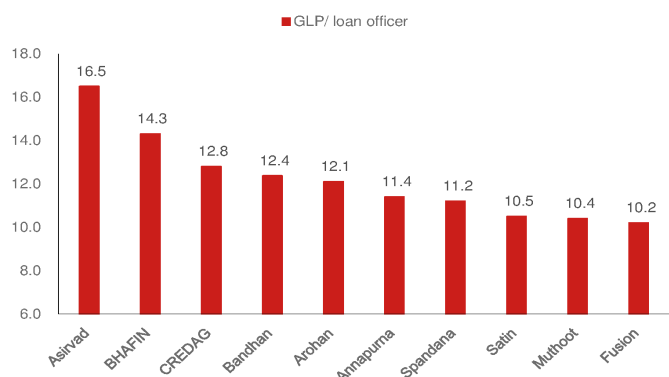
Fig. 157: Per employee cost CAGR vs . peers



Source: MFIN, Company data, Nomura research

- Customers per loan officer remain lower due to its weekly collection model but GLP/ loan officer is still better than peers due to its higher AUM per customer, aiding to record similar or better productivity levels.

Fig. 158: GLP per loan officer still better due to higher AUM per customer



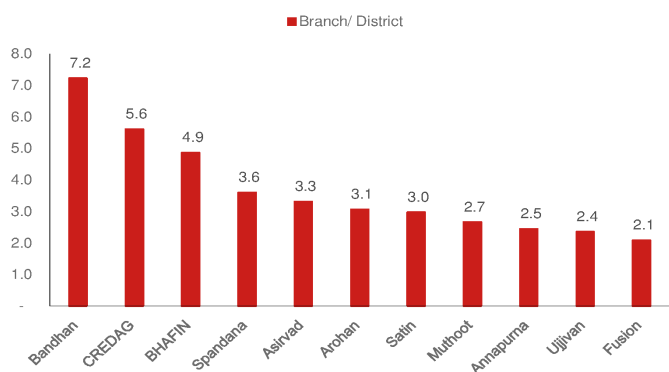
Source: Company data, Nomura research

Fig. 159: Customer/ loan officer lower due to the weekly collection model followed by CRETAG



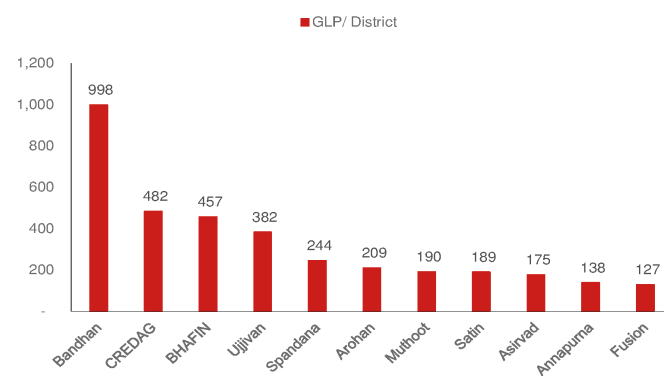
Source: Company data, Nomura research

Fig. 160: CRETAG has higher number of branches per district vs peers ...



Note: DSCs in case of Bandhan
Source: Company data, Nomura research

Fig. 161: ...leading to its better GLP per district



Note: DSCs in case of Bandhan
Source: Company data, Nomura research

Prudent underwriting practices, and a superior risk management framework

Prudent borrower selection process

- CRETAG follows a strict leverage rule of INR0.1mn (vs a RBI's cap of INR0.125mn) to a borrower and the overall limit of three financial institutions where the borrower will be rejected if she does not meet the overall criteria.
- Further, it puts enough emphasis on the following at the time of group formation – (1) the borrower group has to necessarily be within the 500m radius; (2) the borrower group needs to be self-chosen, without any staff interference; and (3) multiple legs of credit bureau checks, along with compulsory five-day training, before the disbursement of loan. This does increase its turnaround time to around 15 days for the initial disbursement, but also ensures prudent selection of customers.
- From accounting perspective as well, CRETAG follows NPA recognition of 60 DPD (days past due) and 15 DPD for stage-2 vs. regulatory requirement of 90 DPD and 60 DPD, respectively. It also writes-off loans at 270 DPD.
- Collusion risk is mitigated by placing the employees 100-150kms away from their respective home locations.

Alignment of employee interests

- CRETAG has been successful in aligning its employee interests with the long-term goals of the business, as well as ensuring a strong employee culture which has led to a much stable employee base over time while keeping its employee costs lower.
- Its top management has an average vintage of 15-20 y ears in the financial services domain within CRETAG/ other large banks/ financial institutions.
- Its attrition rate is also lower than the industry, with 25% employee attrition vs. the

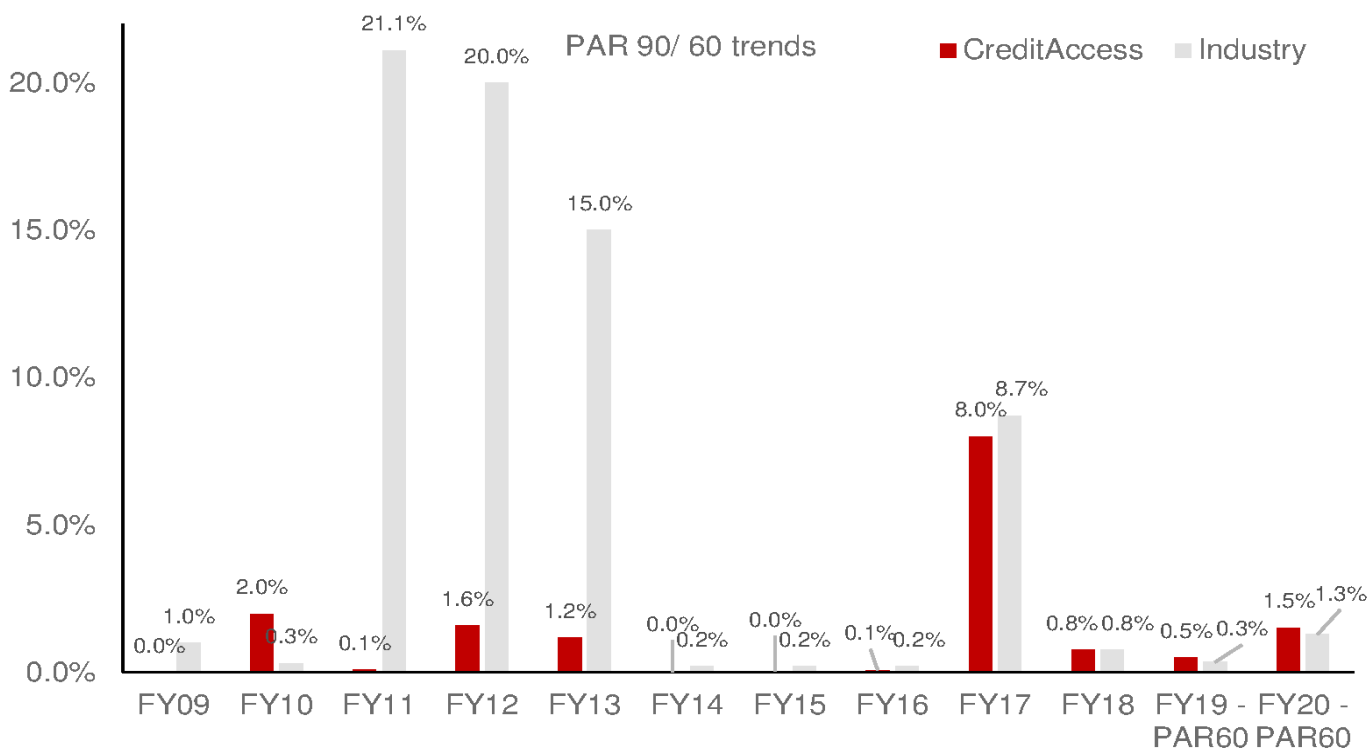
industry average of 35%.

- We see few reasons for its lower attrition and a much stable employee base: (1) CREDAG largely depends on fresh hires at entry level jobs, largely from the local community and a good portion of that comes from families of active customers; (2) these loan officers reside in branches itself, thereby saving on rental costs; (3) collusion risk is mitigated by placing the employees 100-150kms away from their respective home locations and keeps only five-day work week to ensure these employees can go back to their home towns on weekends; (4) a clear development path for its employees, with a potential to be promoted from loan officer to branch manager to area manager within the age of 30 years; and (5) its incentive structures are rightly aligned to number of customers serviced, the number of customers added and process adherence, and not linked to disbursements or collections which may lead to inferior underwriting practices.

Superior underwriting track record; delivered better in the past cycle

- CREDAG has benefitted from its customer-centric approach, its prudent customer selection, and superior risk management framework; this is evident from its superior performance during the past disruptions, such as demonetization, and has aided CREDAG to deliver sustainably lower through-cycle credit cost.
- Over FY16-20, the annual credit cost for CREDAG at 170bps was meaningfully lower than top players, at 160-240bps annually, despite the 60-day recognition followed by CREDAG starting from FY19.

Fig. 162: CREDAG 's delinquency trends have been superior through the past cycles...



Source: Company data, Nomura research

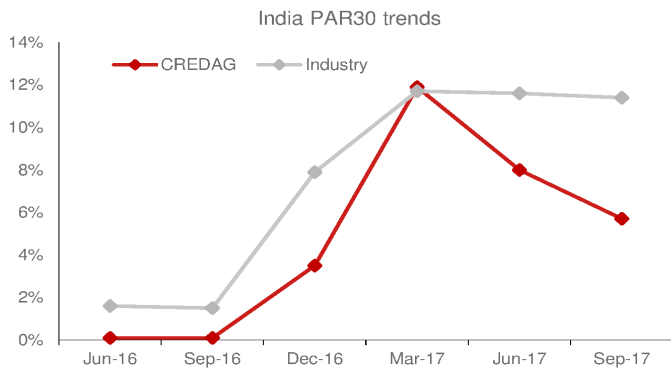
Fig. 163: ...driving superior credit cost vs . peers

Credit cost %	FY12	FY13	FY14	FY15	FY16	FY17	FY18	FY19	FY20
Credit Access	-0.6%	1.3%	1.1%	0.7%	0.7%	3.9%	-0.3%	1.3%	3.0%
Spandana		68.1%	0.5%	0.5%	0.9%	3.3%	1.7%	1.2%	4.9%
BHAFIN	52.1%	20.1%	0.9%	0.4%	1.0%	5.9%	1.1%	0.8%	
Satin	0.3%	0.5%	1.1%	0.6%	0.6%	1.5%	1.0%	0.9%	2.8%
Bandhan						0.5%	1.4%	2.2%	2.6%
Ujjivan	0.9%	0.8%	0.6%	0.9%	0.6%	1.3%	4.5%	0.4%	1.4%
Equitas	0.8%	0.8%	0.9%	1.6%	1.2%	1.6%	2.2%	0.9%	1.8%
Top 7 MFI lenders - credit cost	13.5%	17.9%	0.9%	0.8%	0.9%	2.0%	1.6%	1.4%	2.5%

Source: Company data, Nomura research

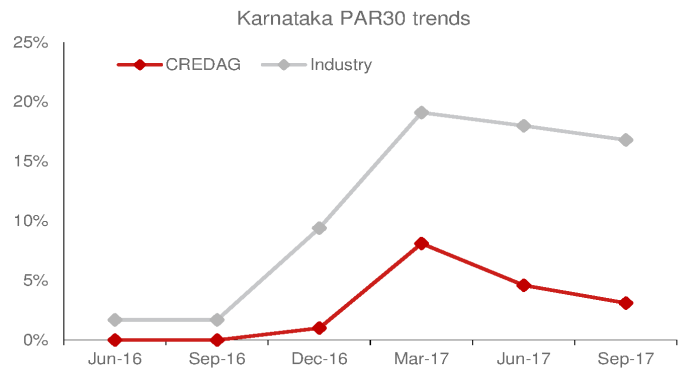
- More specifically, during demonetization, CREDAG's performance across impacted states was better than peers, with a relatively lower spike in portfolio at risk (PAR) and a much sharper recovery post-demonetization.

Fig. 164: India – PAR30 trends



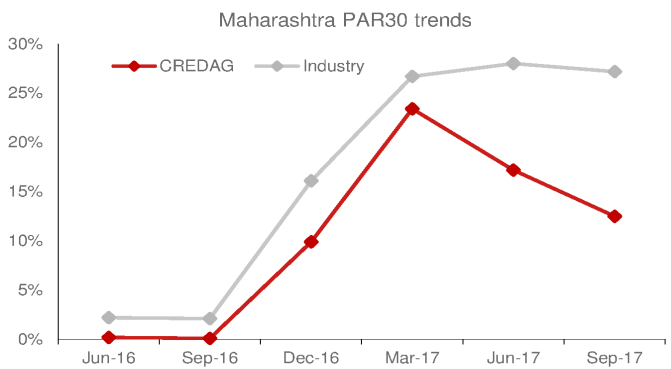
Source: Company data, Nomura research

Fig. 165: Karnataka – PAR30 trends



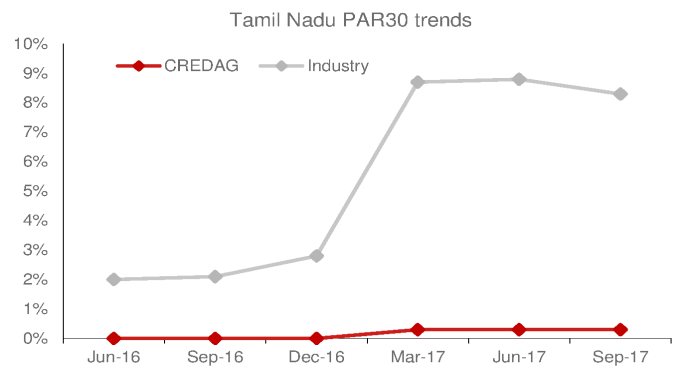
Source: Company data, Nomura research

Fig. 166: Maharashtra – PAR30 trends



Source: Company data, Nomura research

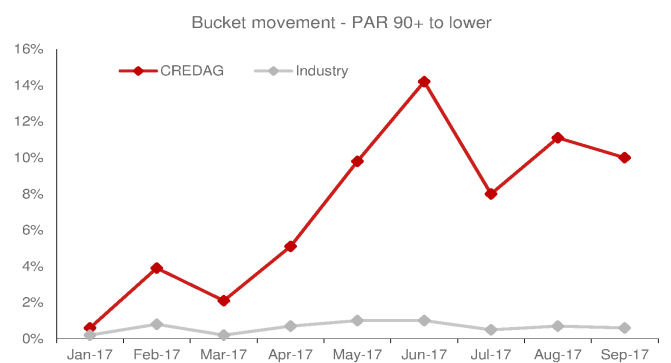
Fig. 167: Tamil Nadu – PAR30 trends



Source: Company data, Nomura research

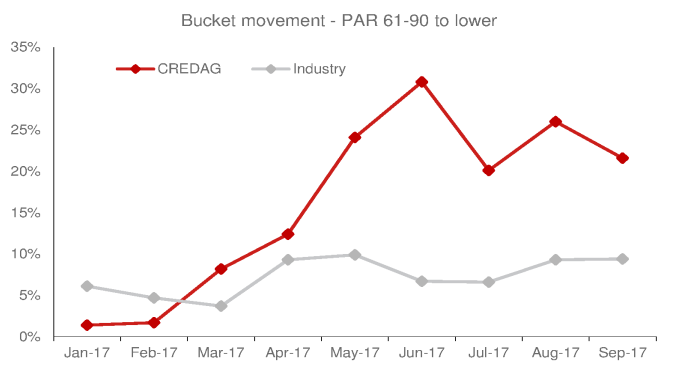
- Sharp backward bucket movement (upgrades across buckets) for CREDAG, compared with the industry, exhibits its ability to bounce back faster from the initial disruption.

Fig. 168: Rollbacks - PAR 90+ to lower bucket



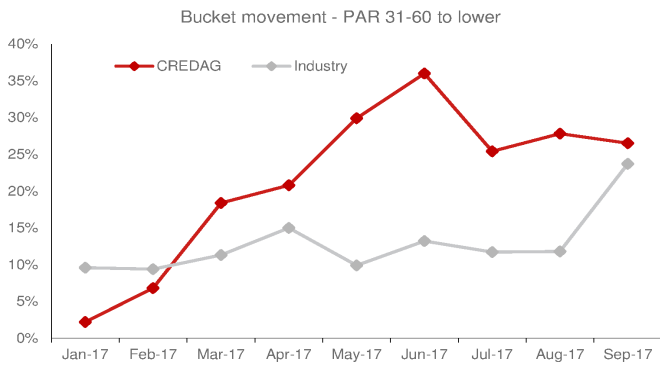
Source: Company data, Nomura research

Fig. 169: Rollbacks - PAR 61-90 to lower buckets



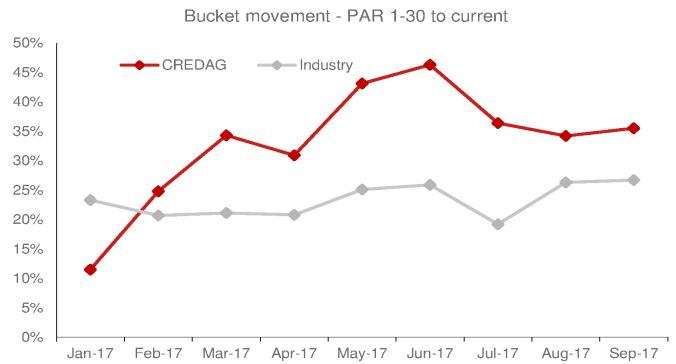
Source: Company data, Nomura research

Fig. 170: Rollbacks - PAR 31-60 to lower bucket



Source: Company data, Nomura research

Fig. 171: Rollbacks - PAR 1-30 to current bucket

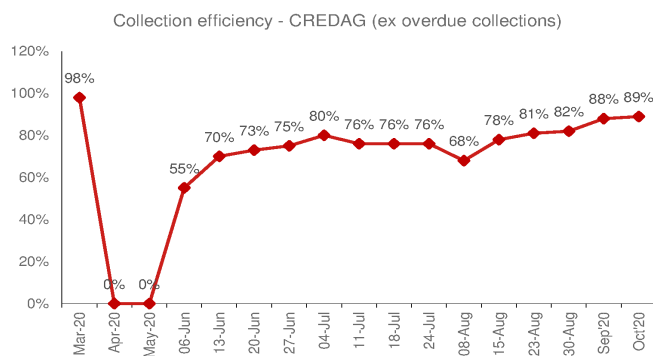


Source: Company data, Nomura research

COVID-19 pandemic impact large but still manageable

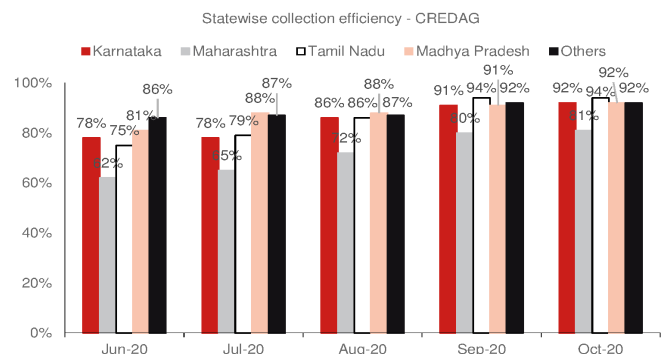
- The impact on unsecured retail products is clearly higher than secured products but we have seen a sharp recovery in collection efficiency across players and across geographies. CREDAG's collection efficiency for Oct-20 stood at 89%.
- We build in an average credit cost of 350-450bp in FY21F for MFI companies under over coverage, and further build in a slightly elevated credit cost for FY22F; however, we think eventual write-offs should be fairly manageable given the earnings profiles of these large MFIs.
- Collection efficiency for CREDAG has been marginally below peers, with a higher share of Maharashtra (where the impact is higher) dragging overall collections.
- We remain confident that MFIs will see much sharper/faster normalization both in growth (shorter duration book) and credit costs (accelerated provisioning) in FY22F; and think ROE should normalize sooner than anticipated earlier
- We are building in credit cost of 435/200bps for CREDAG in FY21/22F which should take care of the COVID-19 pandemic impact, in our view. CREDAG has already build in a COVID-19 pandemic buffer of 310bps for AUMs.

Fig. 172: Overall collections for CREDAG have improved to 89%



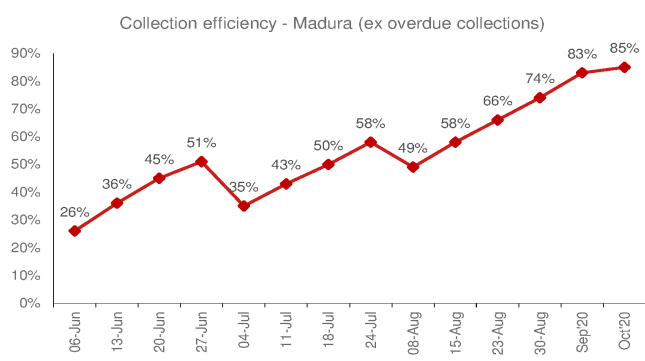
Source: Company data, Nomura research

Fig. 173: State-wise collection efficiency - CREDAG



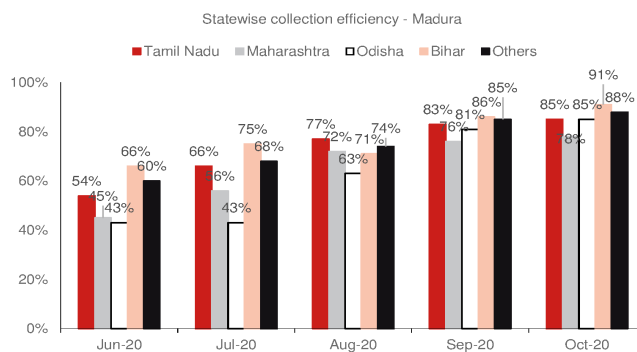
Source: Company data, Nomura research

Fig. 174: Madura collections still lagging at 85%



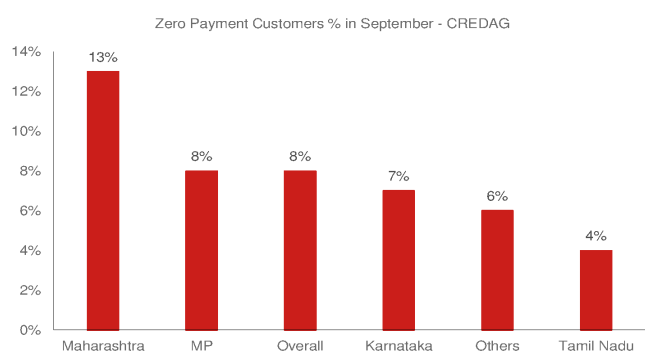
Source: Company data, Nomura research

Fig. 175: State-wise collection efficiency - Madura



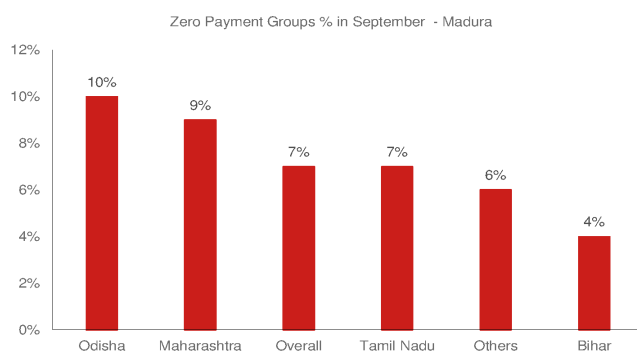
Source: Company data, Nomura research

Fig. 176: Zero payment customer at 8% in Sept (CAGL) – o f w hich 24% activated in October



Source: Company data, Nomura research

Fig. 177: Zero payment customer at 7% in Sept (MMFL) – o f w hich 33% activated in October



Source: Company data, Nomura research

Fig. 178: Collections nearing pre-C OVID-19 pandemic levels for top MFI players

MFI collection efficiency (%)	Covid							
	Mar-20	Apr-20	May-20	Jun-20	Jul-20	Aug-20	Sep-20	Oct-20
Ujjivan	93.0%	2.0%	14.0%	53.0%	60.0%	68.0%	83.0%	88.0%
Equitas	77.0%	0.0%	7.0%	42.0%	61.0%	77.0%		91.0%
BHAFIN			12.5%	71.0%			91.0%	93.0%
Satin		3.0%	17.0%	62.0%	85.0%	86.0%	94.0%	
Spandana		2.0%	23.0%	60.0%	75.0%	80.0%	88.0%	93.0%
CREDAG	98.0%	0.0%	0.0%	74.0%	76.0%	82.0%	88.0%	89.0%
Bandhan				68.0%			89.0%	91.0%

Source: Company data, Nomura research

Expect ~40% PAT CAGR and ROEs to normalize to 18% (FY23)

- Over FY14-20, CREDAG has delivered a strong 52% AUM CAGR, and has delivered average ROEs of 16% and a PAT CAGR of >60%.
- We expect CREDAG to continue its momentum over medium term, with >2x jump in branches over past 3 years, large market opportunity and possibility of improving operating efficiency (especially Madura), while we remain wary of the near-term risks.
- We build in an AUM CAGR of 19% over FY20-23F vs our industry growth expectations of 18% CAGR while we do not build in any meaningful improvement in cost ratios from here on.
- We do factor in the COVID-19 pandemic related impact for CREDAG, with credit cost expectations at 435/200bps for FY21/22F.
- With this we expect ROA/ROEs to mean revert to 4.8/18% by FY23F, with normalized credit cost of 1.35% (by FY23F). While the impact from COVID-19 pandemic may be higher than that for other secured products, a sharp rebound in collection efficiency, average PPOP/assets of >7% for FY21-23F and healthy capital ratios give us

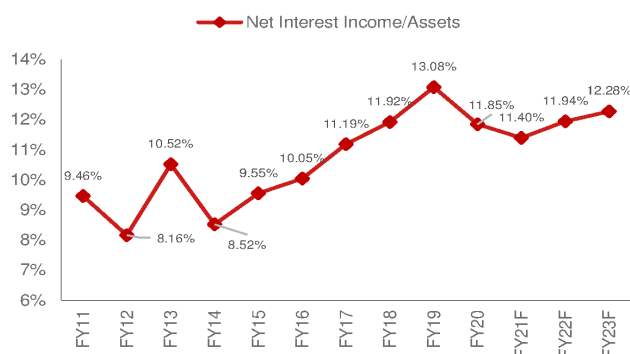
confidence that CREDAG will likely be able to navigate the crisis much better.

Fig. 179: RoA decomposition: We expect RoEs to mean revert to 81% by FY23

RoA decomposition	CREDAG + Madura Merged												
	FY11	FY12	FY13	FY14	FY15	FY16	FY17	FY18	FY19	FY20	FY21F	FY22F	FY23F
Net Interest Income/Assets	9.46%	8.16%	10.52%	8.52%	9.55%	10.05%	11.19%	11.92%	13.08%	11.85%	11.40%	11.94%	12.28%
Fees/Assets	4.77%	2.94%	2.00%	1.77%	1.77%	1.66%	1.15%	0.18%	0.14%	0.12%	0.09%	0.12%	0.15%
Investment profits/Assets	0.00%	0.00%	0.00%	0.24%	0.33%	0.18%	0.12%	0.10%	0.92%	0.64%	0.31%	0.20%	0.16%
Net revenues/Assets	14.23%	11.11%	12.51%	10.53%	11.65%	11.88%	12.45%	12.20%	14.14%	12.61%	11.80%	12.26%	12.59%
Operating Expense/Assets	-11.86%	-12.20%	-9.09%	-6.04%	-5.36%	-5.27%	-5.17%	-4.78%	-4.80%	-4.78%	-4.81%	-4.98%	-4.95%
PPOP/ Assets	2.37%	-1.10%	3.43%	4.49%	6.29%	6.62%	7.28%	7.41%	9.34%	7.82%	6.99%	7.28%	7.63%
Core PPOP/ Assets	2.37%	-1.10%	3.43%	4.24%	5.96%	6.44%	7.17%	7.32%	8.42%	7.19%	6.68%	7.08%	7.47%
Provisions/Assets	-1.24%	0.50%	-1.11%	-0.77%	-0.52%	-0.64%	-3.51%	0.32%	-1.22%	-2.71%	-3.57%	-1.82%	-1.27%
Taxes/Assets	-0.08%	-0.42%	-0.15%	-1.23%	-2.02%	-2.14%	-1.34%	-2.73%	-2.87%	-1.40%	-0.86%	-1.38%	-1.60%
Total Costs/Assets	-13.19%	-12.12%	-10.35%	-8.04%	-7.90%	-8.04%	-10.02%	-7.19%	-8.89%	-8.89%	-9.25%	-8.18%	-7.82%
ROA	1.05%	-1.01%	2.16%	2.49%	3.75%	3.84%	2.43%	5.00%	5.25%	3.71%	2.55%	4.08%	4.76%
Leverage (x)	6.4	5.5	4.8	4.6	4.5	5.2	5.4	4.0	3.2	3.5	3.9	3.5	3.7
ROE	6.75%	-5.55%	10.36%	11.47%	16.71%	19.81%	13.02%	19.97%	16.92%	13.01%	9.93%	14.34%	17.46%
LLP/ Loans (Credit cost)	1.60%	-0.62%	1.29%	1.07%	0.67%	0.73%	3.90%	-0.34%	1.30%	3.03%	4.33%	1.99%	1.36%
EPS	1.4	-1.2	2.1	3.5	6.8	11.5	8.8	16.5	22.4	22.7	21.0	39.2	56.0
BVPS	21.6	20.5	28.4	39.9	52.2	63.7	80.6	111.9	164.8	185.4	253.6	292.8	348.8

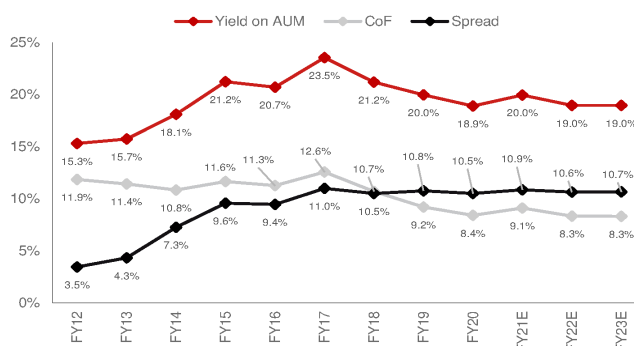
Source: Company data, Nomura estimates

Fig. 180: We expect some improvement in margins



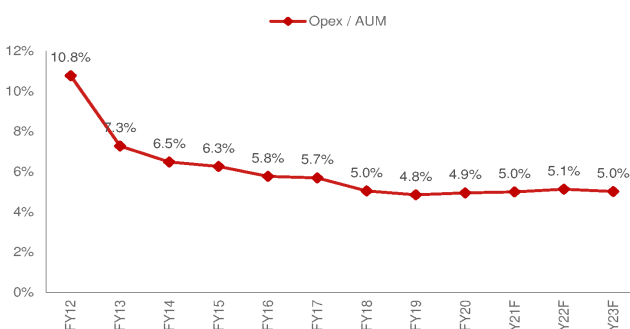
Source: Company data, Nomura estimates

Fig. 181: Lending spreads have improved



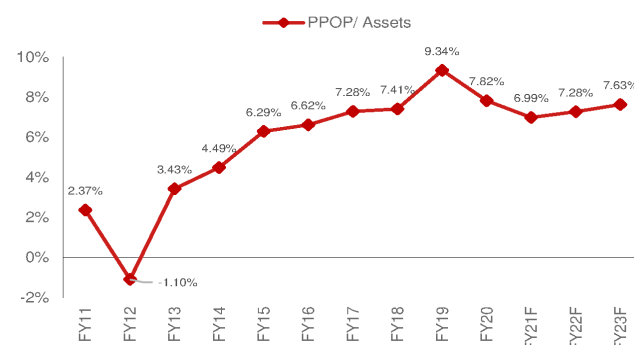
Source: Company data, Nomura estimates

Fig. 182: OPex to AUM steady at ~5%



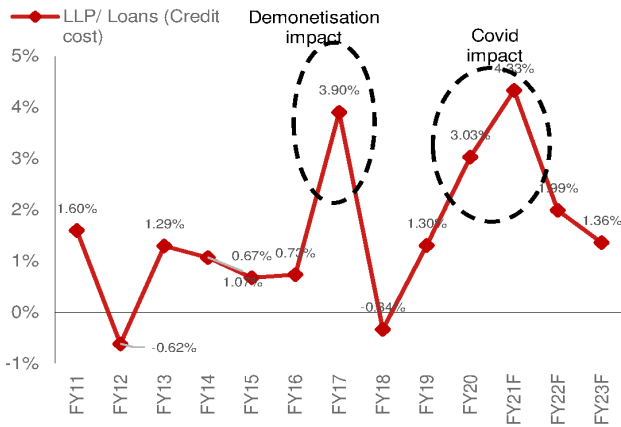
Source: Company data, Nomura estimates

Fig. 183: Strong operational performance – we expect PPOP/AUM at 7.3-7.6% over FY22-23



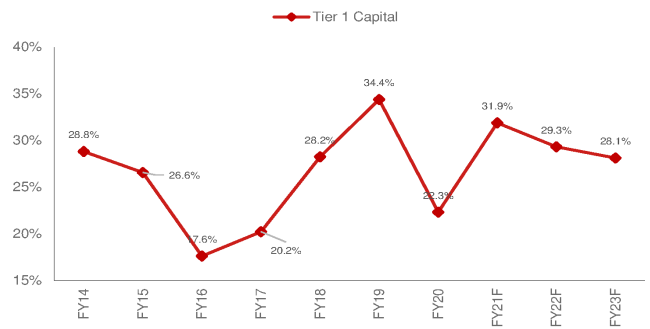
Source: Company data, Nomura estimates

Fig. 184: Credit cost performance has been better than industry through past cycles



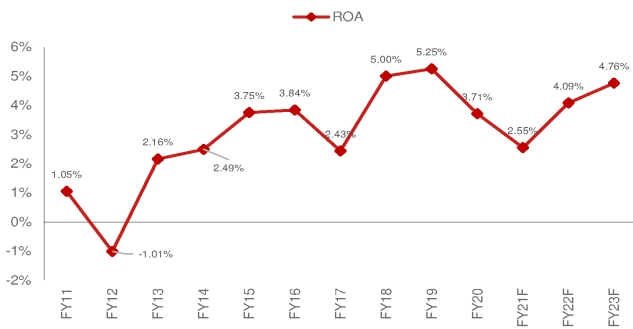
Source: Company data, Nomura estimates

Fig. 185: Capital adequacy strong post capital raise in October



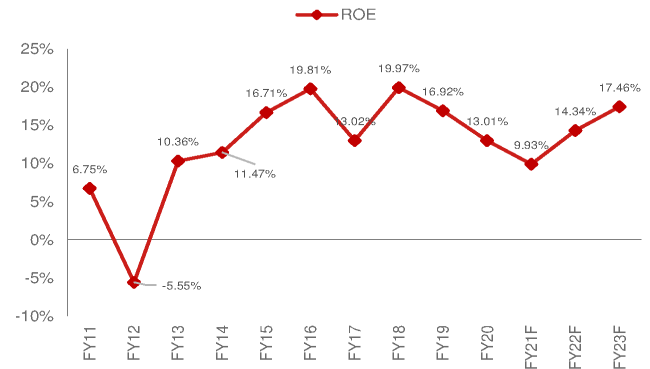
Source: Company data, Nomura estimates

Fig. 186: We expect RoAs to recover to 4.1-4.8% by FY22-23



Source: Company data, Nomura estimates

Fig. 187: We expect RoEs of 18% by FY23



Source: Company data, Nomura estimates

Fig. 188: Our expectations for key MFI players

Key microfinance players - NMR estimates			
PPOP	FY21F	FY22F	FY23F
Bandhan	6.28%	6.07%	6.07%
Equitas	3.48%	3.30%	3.50%
Ujjivan	4.68%	4.40%	4.51%
CREDAG	6.99%	7.28%	7.63%
Credit Cost			
Bandhan	3.50%	1.63%	1.58%
Equitas	2.51%	2.07%	1.56%
Ujjivan	3.58%	2.48%	2.07%
CREDAG	4.33%	1.99%	1.36%
RoA			
Bandhan	2.81%	3.69%	3.72%
Equitas	1.26%	1.36%	1.73%
Ujjivan	1.46%	1.88%	2.19%
CREDAG	2.55%	4.09%	4.76%
AUM growth			
Bandhan	13.1%	16.7%	18.7%
Equitas	26.0%	24.5%	23.3%
Ujjivan	8.7%	24.2%	21.5%
CREDAG	33.7%	25.6%	24.2%
RoE			
Bandhan	16.6%	21.7%	21.5%
Equitas	9.3%	10.3%	13.4%
Ujjivan	8.2%	11.1%	13.9%
CREDAG	9.9%	14.3%	17.5%
Tier 1			
Bandhan	24.9%	25.3%	25.5%
Equitas	22.8%	20.4%	19.1%
Ujjivan	31.0%	27.6%	25.9%
CREDAG	31.9%	29.3%	28.1%

Source: Company data, Nomura estimates

Premium valuations to sustain

- We see CREDAG to be the best placed in the MFI segment with its prudent management, superior track record, and best operating standards. This, coupled with its high growth and high return ratio opportunity, makes CREDAG best placed to play the MFI theme. We believe CREDAG will continue to command a premium over peers given its superior track record, high growth prospects and expectations of ROEs to normalize fully by FY23F. Thus, we initiate on CREDAG with a Buy rating and a TP of INR950/share, implying 24% upside.
- **Valuation based on a residual income model:** We value CREDAG based on Residual income model to arrive at our target price of INR950 implying a 2.7x FY23F book multiple. We expect CREDAG to deliver 17-18% sustainably v/s cost of equity of 12-13%. We assume avg RoEs and beta at 17.4% and 1.3 over stage 1 and stage 2

and terminal RoEs and beta of 17% and 1.2. Contribution of terminal value to our valuation is ~40% which is reasonable, in our view.

Fig. 189: Our TP of INR950/share implies 2.7x FY23F book

	INR mn	Contribution of value	Avg. ROE assumption	Avg. COE assumption
FY23 networth	55,102	36.8%		
PV of RI over FY24-28F	13,750	9.2%	17.4%	12.50%
PV of RI over FY29-35F	22,025	14.7%	17.4%	12.50%
Terminal value	57,360	38.3%	17.0%	12.00%
Total value of the firm	1,49,719	100%		
Total number of shares	158			
Value per share	950			
Implied P/B	2.7			
Terminal growth assumption	5.0%			

Source: Company data, Nomura estimates

Fig. 190: Peer valuation s – comparison

Banks	Ticker	Rating	TP	P/B			P/E			ROE			LTP
				FY21F	FY22F	FY23F	FY21F	FY22F	FY23F	FY21F	FY22F	FY23F	
Corporate Banks													
Axis	AXSB IN	Buy	640	1.79	1.60	1.40	23.3	14.4	10.7	8.4%	11.8%	13.9%	635
ICICI	ICICIB IN	Buy	625	1.87	1.68	1.47	18.1	13.5	10.5	11.4%	13.1%	14.9%	511
SBI	SBIN IN	Buy	275	0.65	0.60	0.54	13.5	6.8	5.4	4.9%	9.2%	10.5%	271
BOB	BOB IN	Neutral	50	0.53	0.51	0.47	NM	37.5	8.0	-3.7%	1.2%	5.3%	66
Retail Banks													
HDFCB	HDFCB IN	Buy	1,450	3.87	3.35	2.85	27.5	21.7	17.0	14.9%	16.6%	18.2%	1,406
Kotak	KMB IN	Neutral	1,570	4.71	4.19	3.71	41.0	35.7	30.8	13.0%	12.4%	12.8%	1,885
NBFCs/ HFCs													
HDFC	HDFC IN	Buy	2,425	2.33	2.13	1.94	25.8	20.1	16.8	10.6%	11.6%	12.6%	2,309
MMFSL	MMFS IN	Neutral	130	1.40	1.29	1.17	26.5	12.1	9.5	5.8%	10.8%	12.6%	177
New Banks/ MFIs													
Equitas	EQUITAS IN	Buy	95	1.03	0.93	0.81	12.3	9.5	6.5	9.3%	10.3%	13.4%	73
Bandhan Bank	BANDHAN IN	Buy	490	3.76	3.18	2.68	24.0	15.9	13.6	16.6%	21.7%	21.5%	400
AU SFB	AUBANK IN	Neutral	790	5.78	5.10	4.27	44.6	40.6	24.6	10.4%	13.4%	18.9%	918
Ujjivan	UJJIVAN IN	Buy	360	1.51	1.36	1.19	19.2	12.9	9.1	8.2%	11.1%	13.9%	286
CREDAI	CREDAI IN	Buy	950	3.03	2.62	2.20	36.6	19.6	13.7	9.9%	14.3%	17.5%	768

Note: Priced as at close of markets on 9 December 2020

Source: Company data, Nomura research

Brief history of CREDAG

Fig. 191: Key events and milestones

Year	Key events
1991	Incorporated as Sanni Collection Pvt Ltd (SCPL) in Jun-91 at Calcutta, West Bengal
1998	Obtained NBFC registration
2007	Feb '07 - The entire shareholding of SCPL was acquired by Vinatha M. Reddy, Vijitha Subbaiah and Suresh K. Krishna Oct '07 - SCPL acquired the microfinance business under T. Muniswamappa Trust ("TMT") along with the brand name "Grameen Koota" (TMT had began its microfinance operation in Karnataka in 1999 under brane name "Grameen kota")
2008	Name of SPCL changed to Grameen Financial Services Private Limited Commenced operations in Maharashtra
2009	Started operations in Tamil Nadu
2013	RBI granted NBFC-MFI status and the name of the company was changed to Grameen Koota Financial Services Private Limited
2014	CAA acquired a majority stake in the Company
2015	Commenced operations in Madhya Pradesh and Chhattisgarh
2016	99% subsidiary of CreditAccess Asia
2017	Started Retail finance business
2018	Company name changed to CreditAccess Grameen Limited CREDAG listed on NSE & BSE - Raised fresh issue of INR6.3bn and OFS of INR5bn Enters Odisha, Goa, Kerala and Puducherry
2018	Crosses 2.5mn borrower Enters 5 new states - Jharkhand, Rajasthan, Gujarat, UP and Bihar
2019	Announced acquisition with Madura Microfinance

Source: Company data, Nomura research

Strong management pedigree

- CREDAG has an experienced top management team led by Mr. Udaya Kumar Hebbar (MD & CEO) and Mr. Diwakar BR (CFO), who have 25-30 years of experience in the financial services domain. The top management team is seasoned with 15-20 years of average work-experience at CREDAG or at other large banks/ financial institutions.

Fig. 192: Senior management personnel

Key Management	Brief Profile
Udaya Kumar Hebbar Managing Director and CEO	Mr Udaya Kumar Hebbar has 30 years of experience in the financial services domain. Prior to joining CREDAG, he has been associated with ICICI Bank, Barclays Bank and Corporation Bank. He holds a master's degree in commerce, CAIIB from the Indian Institute of Bankers and is a graduate in banking operations and technology from BAI, USA.
Diwakar BR Director - Finance & CFO	Mr Diwakar joined the company in Oct -11 and has more than 25 years of experience in the financial services sector. Prior to joining CREDAG, he has worked with SIDBI, ICICI Bank and at ACCION International. He holds a Masters degree in Commerce.
Sundar Arumugam Head of Strategy and Innovation	Mr Arumugam was earlier associated with CreditAccess Asia as head of business innovation. Prior to CAA, he was head of product management at Equifax India where he led product strategy and execution. He was part of the start-up team at Equifax India and was instrumental in setting up the microfinance bureau, leading the business unit for four years. He holds a bachelor's degree in technology and an MBA from INSEAD.
Ganesh Narayanan Chief Business Officer	Mr Narayanan joined CREDAG in Jan 20 and has +21 years of experience in the financial services industry. Prior to joining the company, he was the Group President & Deputy National Head – Indian Financial Institutions Banking at Yes Bank.
Firoz Anam Chief Risk Officer	Mr Firoz joined CREDAG in 2020. In his previous roles, he has managed credit and operational risk functions at IDFC Bank, JP Morgan Chase and Citibank. He is a B.Tech from IIT Kharagpur and holds PGDM from IIM-Bangalore.
Srivatsa H N Business Head - Group lending (Karnataka and Tamil Nadu)	Mr Srivatsa HN has been with CREDAG since 2007 (joined TMT in 2002) and has 15+ years of experience in microfinance operations. He holds a pre-university certificate issued by the Education Department, Government of Karnataka.
Gopal Reddy Business head - Group lending (Maharashtra, MP and Chhattisgarh)	Mr Reddy has been with CREDAG since 2007 (joined TMT in 1999) and has over 15 years of experience in microfinance operations. He holds a bachelor's degree in commerce from Bangalore University.
Vishwanath Bhat Head - Retail Finance	Mr Vishwanath joined CREDAG in Jun-16. Previously he has been associated with Shriram Group, Chola, ICICI Bank, Copal Amba (Moody's Analytics Company) and Axis Bank. He holds a post graduate degree in management.
Gururaj K S Rao Chief Audit Officer	Mr Rao joined CREDAG in 2009 and has 24 years of experience in auditing. He holds a bachelor's degree in commerce from Bangalore University.
M. J. Mahadev Prakash Head - Compliance, Legal & CS	Mr Mahadev Prakash joined the company in Dec-19. Prior to joining CREDAG, he was associated with EY, J. Sagar Associates, Janalakshmi SFB, RMZ Corp, BPL Ltd., and Bal Pharma Ltd. He is also an Associate member of the Institute of Company Secretaries of India, New Delhi.

Source: Company data, Nomura research

Financial summary

Fig. 193: CREDAI – summary of financials

PL Statement	CREDAI						Merged		
	FY15	FY16	FY17	FY18	FY19	FY20	FY21F	FY22F	FY23F
Interest income	2,537	4,266	6,702	8,597	12,183	16,172	23,531	28,094	35,010
Interest expenses	1,279	2,074	3,243	3,537	4,168	5,727	8,725	10,001	12,208
NII	1,258	2,192	3,459	5,060	8,016	10,445	14,807	18,093	22,802
Other income	277	401	391	118	650	672	519	484	580
Total income	1,535	2,593	3,850	5,179	8,666	11,117	15,325	18,576	23,381
Employee exp	436	707	1,047	1,304	1,861	2,596	4,045	4,978	6,182
Other overheads	270	442	551	726	1,079	1,622	2,206	2,572	3,020
PPOP	829	1,444	2,252	3,148	5,726	6,899	9,074	11,026	14,179
Credit cost	68	140	1,086	-134	749	2,390	4,643	2,752	2,350
PBT	761	1,304	1,166	3,282	4,977	4,509	4,431	8,274	11,829
Tax	266	466	413	1,157	1,760	1,234	1,117	2,085	2,981
PAT	495	838	753	2,125	3,218	3,275	3,314	6,189	8,848
Balancesheet									
	FY15	FY16	FY17	FY18	FY19	FY20	FY21F	FY22F	FY23F
Share Capital	730	730	857	1,284	1,436	1,440	1,580	1,580	1,580
Reserves	3,080	3,920	6,051	13,091	22,215	25,251	38,485	44,674	53,522
Net Worth	3,809	4,649	6,908	14,375	23,651	26,691	40,065	46,254	55,102
Borrowings	5,850	11,421	11,759	36,235	48,666	78,226	1,01,617	1,25,686	1,54,952
Other liabilities	7,619	11,976	16,489	1,643	3,977	5,609	6,272	6,585	6,915
Total liabilities	13,469	23,397	28,248	37,877	52,643	83,834	1,07,889	1,32,271	1,61,867
Equity + Liabilities	17,278	28,047	35,156	52,252	76,293	1,10,525	1,47,954	1,78,525	2,16,968
Advances	13,531	24,754	30,891	48,955	66,028	91,726	1,22,626	1,54,014	1,91,281
Investments	2	2	2	2	2	6,614	3,000	3,000	3,000
Cash and equivalents	2,798	2,549	3,637	1,431	6,156	5,804	10,689	9,620	10,582
Fixed assets (incl goodwill)	62	113	153	172	271	895	5,569	5,517	5,414
Other assets	885	628	473	1,692	3,836	5,485	6,069	6,373	6,691
Total Assets	17,278	28,047	35,156	52,252	76,293	1,10,525	1,47,954	1,78,525	2,16,968
Avg earning assets	13,173	21,818	30,917	42,459	61,287	88,166	1,29,882	1,51,475	1,85,749
Du PONT (on avg EA)									
	FY15	FY16	FY17	FY18	FY19	FY20	FY21F	FY22F	FY23F
Interest income	19.3%	19.6%	21.7%	20.2%	19.9%	18.3%	18.1%	18.5%	18.8%
Interest expenses	9.7%	9.5%	10.5%	8.3%	6.8%	6.5%	6.7%	6.6%	6.6%
NII	9.6%	10.0%	11.2%	11.9%	13.1%	11.8%	11.4%	11.9%	12.3%
Other income	2.1%	1.8%	1.3%	0.3%	1.1%	0.8%	0.4%	0.3%	0.3%
Total income	11.7%	11.9%	12.5%	12.2%	14.1%	12.6%	11.8%	12.3%	12.6%
Employee exp	3.3%	3.2%	3.4%	3.1%	3.0%	2.9%	3.1%	3.3%	3.3%
Other overheads	2.0%	2.0%	1.8%	1.7%	1.8%	1.8%	1.7%	1.7%	1.6%
PPOP	6.3%	6.6%	7.3%	7.4%	9.3%	7.8%	7.0%	7.3%	7.6%
Credit cost	0.5%	0.6%	3.5%	-0.3%	1.2%	2.7%	3.6%	1.8%	1.3%
PBT	5.8%	6.0%	3.8%	7.7%	8.1%	5.1%	3.4%	5.5%	6.4%
Tax	2.0%	2.1%	1.3%	2.7%	2.9%	1.4%	0.9%	1.4%	1.6%
PAT - RoA	3.8%	3.8%	2.4%	5.0%	5.3%	3.7%	2.6%	4.1%	4.8%
RoE	16.7%	19.8%	13.0%	20.0%	16.9%	13.0%	9.9%	14.3%	17.5%
EPS	6.8	11.5	8.8	16.5	22.4	22.7	21.0	39.2	56.0
BVPS	52.2	63.7	80.6	111.9	164.8	185.4	253.6	292.8	348.8
No. of shares mn	73	73	86	128	144	144	158	158	158
Face value	10	10	10	10	10	10	10	10	10

Source: Company data, Nomura estimates

Snapshot of Madura

- Madura Micro Finance Ltd (Madura) was started by the erstwhile promoters of Bank of Madura, led by its Founder Chairman Dr. K M Thiagarajan.
- In 2006, Madura received the NBFC/MFI license. Initially, it used to lend to SHGs in Tamil Nadu. In 2006, Madura took over the SHG business of 9500 SHGs from its predecessor organization, Micro Credit Foundation of India (MCFI).
- As of Sep-20, Madura operates across 7 states covering 95 districts through its 459 branches, with strong presence in Tamil Nadu (>60% of GLP).

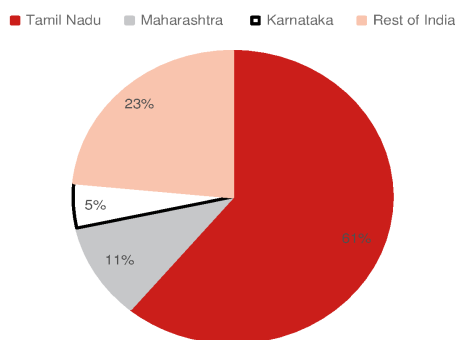
- Madura has an active borrower base of 1.14mn and a gross loan portfolio of INR19.8bn, as of Sep-20.
- Madura has a strong capital adequacy, as of Sep-20, with Tier-1 ratio at 21% and total CAR at 25%.

Fig. 194: Madura – summary financials

PL Statement	Madura						
	FY15	FY16	FY17	FY18	FY19	FY20	1HFY21
Interest income	720	1,103	1,677	2,130	3,689	4,549	2,110
Interest expenses	293	495	711	894	1,499	1,955	931
NII	427	608	966	1,236	2,189	2,595	1,179
Other income	54	85	118	201	179	210	35
Total income	481	693	1,084	1,437	2,369	2,804	1,214
Employee exp	109	164	262	345	464	674	400
Other overheads	123	194	253	261	334	494	162
PPOP	249	335	569	832	1,571	1,636	652
Credit cost	25	46	74	207	350	571	411
PBT	224	289	495	625	1,221	1,064	241
Tax	78	98	193	227	366	267	62
PAT	146	192	302	398	855	797	179
Balancesheet							
	FY15	FY16	FY17	FY18	FY19	FY20	1HFY21
Share Capital	56	56	67	72	72	72	72
Reserves	812	1,004	1,695	2,333	3,150	3,944	4,122
Net Worth	868	1,059	1,761	2,405	3,222	4,016	4,194
Borrowings	3,099	4,694	7,420	9,228	17,264	17,106	16,496
Other liabilities	153	228	317	546	238	364	294
Total liabilities	3,251	4,921	7,737	9,775	17,502	17,471	16,790
Equity + Liabilities	4,119	5,981	9,499	12,179	20,723	21,487	20,984
Assets							
	FY15	FY16	FY17	FY18	FY19	FY20	1HFY21
Advances	3,500	5,177	8,240	11,162	18,415	19,266	18,197
Investments	137	51	67	17	103	454	504
Cash and equivalents	412	629	839	635	1,948	1,372	1,934
Fixed assets (incl goodwill)	16	18	21	37	70	101	80
Other assets	54	106	331	329	188	295	269
Total Assets	4,119	5,981	9,499	12,179	20,723	21,487	20,984
Avg earning assets	3,313	4,953	7,502	10,480	16,140	20,779	20,863
Du PONT (on avg EA)							
	FY15	FY16	FY17	FY18	FY19	FY20	1HFY21
Interest income	21.7%	22.3%	22.3%	20.3%	22.9%	21.9%	20.2%
Interest expenses	8.9%	10.0%	9.5%	8.5%	9.3%	9.4%	8.9%
NII	12.9%	12.3%	12.9%	11.8%	13.6%	12.5%	11.3%
Other income	1.6%	1.7%	1.6%	1.9%	1.1%	1.0%	0.3%
Total income	14.5%	14.0%	14.5%	13.7%	14.7%	13.5%	11.6%
Employee exp	3.3%	3.3%	3.5%	3.3%	2.9%	3.2%	3.8%
Other overheads	3.7%	3.9%	3.4%	2.5%	2.1%	2.4%	1.6%
PPOP	7.5%	6.8%	7.6%	7.9%	9.7%	7.9%	6.3%
Credit cost	0.8%	0.9%	1.0%	2.0%	2.2%	2.8%	3.9%
PBT	6.8%	5.8%	6.6%	6.0%	7.6%	5.1%	2.3%
Tax	2.3%	2.0%	2.6%	2.2%	2.3%	1.3%	0.6%
PAT - RoA	4.4%	3.9%	4.0%	3.8%	5.3%	3.8%	1.7%
RoE	18.4%	19.9%	21.4%	19.1%	30.4%	22.0%	8.7%
EPS							
	FY15	FY16	FY17	FY18	FY19	FY20	1HFY21
EPS	26.3	34.5	45.1	55.4	118.8	110.7	24.9
BVPS	156.1	190.6	263.0	334.2	447.8	558.2	582.9
No. of shares mn	6	6	7	7	7	7	7
Face value	10	10	10	10	10	10	10

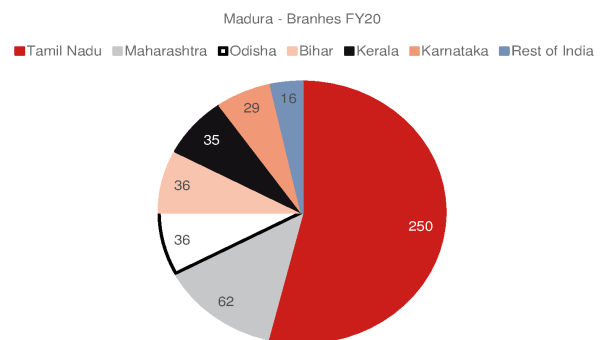
Source: Company data, Nomura research

Fig. 195: Madura AUM mix by state as of FY20



Source: Company data, Nomura research

Fig. 196: State-wise branch mix (FY20)



Source: Company data, Nomura research

Bandhan Bank BANH.NS BANDHAN IN

EQUITY: FINANCIALS

Reiterate Buy; TP increased to INR490 Further re-rating warranted for a deposit + profit engine

Action: Reiterate Buy; TP increased to INR490

Bandhan has done exceptionally well on the liability side, with CASA scaling up to 38% of AUMs in just 4-5 years—far ahead of peers when compared with the same vintage in their journey. On the asset side as well, it is clearly a step ahead, gearing up for the next leg of its universal bank journey. It has created a new vertical- Emerging Entrepreneurs Business (EEB)—for its MFI and micro-home/enterprise business, and the GRUH merger provides the necessary diversification and additional legs to growth. Its strong liability profile (leading to lower cost of funds at 6.2% as at Sep-20) and focus on high-yielding assets makes it the most profitable bank in our India banks coverage (avg PPOP/ assets over FY21-23F of 6.1%), with ROEs expected to normalise from 17% to +21% by FY23F.

Moving in the right direction

Bandhan had highlighted its 5-year strategy, aimed at reducing its micro-banking mix from 65% currently to 30% (Target mix: MFI/ housing/ MSME/ retail loans at 30:30:30:10). It further intends to reduce its concentration in the North East from 65% currently to 27% by FY25. We think Bandhan offers best-in-class funding profile and return ratios, and with gradual diversification underway, it should continue to command premium valuations.

Near term risks a worry, but manageable

Upcoming elections in West Bengal and Assam and pace of recovery in collections moderating (89%/91% collection efficiency for MFI in Sep/Oct-20) does remain a near-term worry, especially for Bandhan, given its higher ticket sizes vs peers. But Bandhan has prudently created cumulative COVID-19 provisions of INR17.4bn—2.3% of AUM (3.5% of micro-banking book). Additionally, core PPOP/Assets of >6% and CET-1 of 22% provide enough buffers, in our view. We continue to factor in credit cost of 350/160bps in FY21/22F (in addition to 100bps prudently provided in 4Q20).

Further re-rating warranted; reiterate Buy with increased TP of INR490

After a 35% run-up in the past 3 months, valuations do reflect better-than-expected recovery trends. That said, we think investors will again start focusing on normalised ROEs and growth once the recognition cycle is behind us and we think Bandhan will see a faster ramp-up in growth and profitability, which will continue to drive a re-rating. Accordingly, we now assign a ~20% higher target P/BV (3.3x vs 2.7x earlier) and roll forward to FY23F to arrive at a TP of INR490 and expect ROEs to normalise to ~21%-22% by FY22/23F.

Year-end 31 Mar	FY20		FY21F		FY22F		FY23F	
Currency (INR)	Actual	Old	New	Old	New	Old	New	
PPOP (mn)	54,466	60,715	60,715	67,411	67,411	78,721	78,721	
Reported net profit (mn)	30,239	26,823	26,823	40,493	40,493	47,547	47,547	
Normalised net profit (mn)	30,239	26,823	26,823	40,493	40,493	47,547	47,547	
FD normalised EPS	18.78	16.66	16.66	25.15	25.15	29.53	29.53	
FD norm. EPS growth (%)	14.8	-11.3	-11.3	51.0	51.0	17.4	17.4	
FD normalised P/E (x)	22.5	–	25.4	–	16.8	–	14.3	
Price/adj. book (x)	4.5	–	4.0	–	3.4	–	2.8	
Price/book (x)	4.5	–	4.0	–	3.4	–	2.8	
Dividend yield (%)	–	–	1.1	–	1.4	–	1.4	
ROE (%)	22.9	16.6	16.6	21.7	21.7	21.5	21.5	
ROA (%)	4.1	2.7	2.7	3.6	3.6	3.6	3.6	

Source: Company data, Nomura estimates

Rating Remains	Buy
Target price Increased from INR 375	INR 490
Closing price 11 December 2020	INR 423
Implied upside	+15.8%
Market Cap (USD mn)	9,253.1
ADT (USD mn)	50.3

Research Analysts

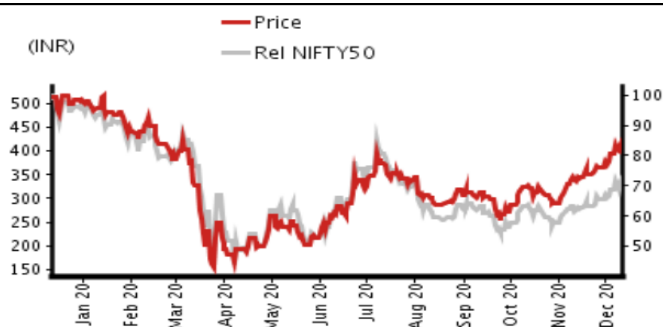
India Banks

Amit Nanavati - NFASL
 amit.nanavati@nomura.com
 +91 22 403 74361

Tanuj Kyal, CFA - NFASL
 tanuj.kyal1@nomura.com
 +91 22 40374220

Key Data on Bandhan Bank

Relative Performance Chart



Performance

(%)	1M	3M	12M		
Absolute (INR)	24.8	35.7	-17.8	M cap (USDm)	9,253.1
Absolute (USD)	25.9	35.5	-21.0	Free float (%)	12.8
Rel to NIFTY50	19.1	18.2	-31.0	3-mth ADT (USDm)	50.3

Profit and loss (INRmn)

Year-end 31 Mar	FY19	FY20	FY21F	FY22F	FY23F
Interest income	66,441	108,855	120,924	138,253	161,595
Interest expense	-21,480	-45,616	-47,788	-54,023	-62,653
Net interest income	44,961	63,239	73,136	84,230	98,942
Net fees and commissions	4,483	5,937	6,627	7,667	8,986
Trading related profits	378	567	708	886	1,107
Other operating revenue	5,770	8,989	10,271	11,496	13,559
Non-interest income	10,630	15,493	17,606	20,048	23,652
Operating income	55,591	78,732	90,742	104,279	122,594
Depreciation	-782	-938	-1,126	-1,351	-1,621
Amortisation	0	0	0	0	0
Operating expenses	-7,241	-9,657	-12,554	-15,065	-17,776
Employee share expense	-10,087	-13,670	-16,348	-20,452	-24,475
Pre-provision op profit	37,482	54,466	60,715	67,411	78,721
Provisions for bad debt	-7,598	-5,031	-24,855	-13,276	-15,156
Other provision charges	246	-8,900	0	0	0
Operating profit	30,131	40,536	35,860	54,135	63,565
Other non-op income	0	0	0	0	0
Associates & JCEs	0	0	0	0	0
Pre-tax profit	30,131	40,536	35,860	54,135	63,565
Income tax	-10,616	-10,297	-9,037	-13,642	-16,018
Net profit after tax	19,515	30,239	26,823	40,493	47,547
Minority interests	0	0	0	0	0
Other items	0	0	0	0	0
Preferred dividends	0	0	0	0	0
Normalised NPAT	19,515	30,239	26,823	40,493	47,547
Extraordinary items	0	0	0	0	0
Reported NPAT	19,515	30,239	26,823	40,493	47,547
Dividends	-4,188	0	-7,536	-9,420	-9,420
Transfer to reserves	15,327	30,239	19,287	31,073	38,127

Growth (%)

Net interest income	48.3	40.7	15.6	15.2	17.5
Non-interest income	50.5	45.7	13.6	13.9	18.0
Non-interest expenses	35.5	33.4	30.0	20.0	18.0
Pre-provision earnings	54.2	45.3	11.5	11.0	16.8
Net profit	45.0	55.0	-11.3	51.0	17.4
Normalised EPS	7.4	55.0	-11.3	51.0	17.4
Normalised FDEPS	45.0	14.8	-11.3	51.0	17.4
Loan growth	33.4	68.1	13.1	16.7	18.7
Interest earning assets	28.7	63.7	15.8	16.6	18.7
Interest bearing liabilities	28.1	67.9	12.4	14.5	18.4
Asset growth	27.4	62.5	15.6	15.1	18.5
Deposit growth	27.6	32.0	17.7	16.3	21.0

Source: Company data, Nomura estimates

Balance sheet (INRmn)

As at 31 Mar	FY19	FY20	FY21F	FY22F	FY23F
Cash and equivalents	35,042	63,449	66,062	66,175	78,364
Inter-bank lending	0	0	0	0	0
Deposits with central bank	0	0	0	0	0
Total securities	22,985	20,080	41,289	47,268	55,974
Other int earning assets	0	0	0	0	0
Gross loans	402,346	672,333	779,248	911,337	1,082,511
Less provisions	-5,912	-6,034	-25,539	-31,812	-38,511
Net loans	396,434	666,299	753,709	879,524	1,044,000
Long-term investments	100,375	153,518	173,436	197,354	232,178
Fixed assets	3,312	3,688	4,618	5,549	6,480
Goodwill	0	0	0	0	0
Other intangible assets	0	0	0	0	0
Other non IEAs	6,270	10,144	20,858	23,879	28,277
Total assets	564,417	917,178	1,059,973	1,219,750	1,445,274
Customer deposits	432,316	570,815	671,985	781,572	945,695
Bank deposits, CDs, debentures	0	0	0	0	0
Other int bearing liabilities	5,214	163,792	153,792	163,792	173,792
Total int bearing liabilities	437,530	734,607	825,777	945,364	1,119,487
Non-int bearing liabilities	14,870	30,617	62,954	72,071	85,346
Total liabilities	452,400	765,223	888,731	1,017,436	1,204,833
Minority interest	0	0	0	0	0
Common stock	11,931	16,102	16,102	16,102	16,102
Preferred stock	0	0	0	0	0
Retained earnings	100,087	135,852	155,139	186,212	224,339
Reserves for credit losses	0	0	0	0	0
Proposed dividends	0	0	0	0	0
Other equity	0	0	0	0	0
Shareholders' equity	112,017	151,955	171,242	202,314	240,441
Total liabilities and equity	564,417	917,178	1,059,973	1,219,750	1,445,274
Non-perf assets	8,196	9,928	36,485	45,446	55,015

Balance sheet ratios (%)

Loans to deposits	93.1	117.8	116.0	116.6	114.5
Equity to assets	19.8	16.6	16.2	16.6	16.6

Asset quality & capital

NPAs/gross loans (%)	2.0	1.5	4.7	5.0	5.1
Bad debt charge/gross loans (%)	1.89	0.75	3.19	1.46	1.40
Loss reserves/assets (%)	1.05	0.66	2.41	2.61	2.66
Loss reserves/NPAs (%)	72.1	60.8	70.0	70.0	70.0
Tier 1 capital ratio (%)	27.9	24.9	24.9	25.3	25.5
Total capital ratio (%)	29.2	27.1	26.9	27.0	26.9

Per share

Reported EPS (INR)	12.12	18.78	16.66	25.15	29.53
Norm EPS (INR)	12.12	18.78	16.66	25.15	29.53
FD norm EPS (INR)	16.36	18.78	16.66	25.15	29.53
DPS (INR)	3.51	0.00	4.68	5.85	5.85
PPOP PS (INR)	23.28	33.82	37.71	41.86	48.89
BVPS (INR)	93.89	94.37	106.34	125.64	149.32
ABVPS (INR)	94.04	93.80	106.34	125.64	149.32
NTAPS (INR)	93.89	94.37	106.34	125.64	149.32

Valuations and ratios

Reported P/E (x)	34.9	22.5	25.4	16.8	14.3
Normalised P/E (x)	34.9	22.5	25.4	16.8	14.3
FD normalised P/E (x)	25.9	22.5	25.4	16.8	14.3
Dividend yield (%)	0.8	-	1.1	1.4	1.4
Price/book (x)	4.5	4.5	4.0	3.4	2.8
Price/adjusted book (x)	4.5	4.5	4.0	3.4	2.8
Net interest margin (%)	12.07	11.44	9.87	9.78	9.76
Yield on assets (%)	17.83	19.69	16.33	16.06	15.95
Cost of int bearing liab (%)	5.51	7.78	6.13	6.10	6.07
Net interest spread (%)	12.32	11.90	10.20	9.96	9.88
Non-interest income (%)	19.1	19.7	19.4	19.2	19.3
Cost to income (%)	32.6	30.8	33.1	35.4	35.8
Effective tax rate (%)	35.2	25.4	25.2	25.2	25.2
Dividend payout (%)	21.5	0.0	28.1	23.3	19.8
ROE (%)	19.0	22.9	16.6	21.7	21.5
ROA (%)	3.87	4.08	2.71	3.55	3.57
Operating ROE (%)	29.3	30.7	22.2	29.0	28.7
Operating ROA (%)	5.98	5.47	3.63	4.75	4.77

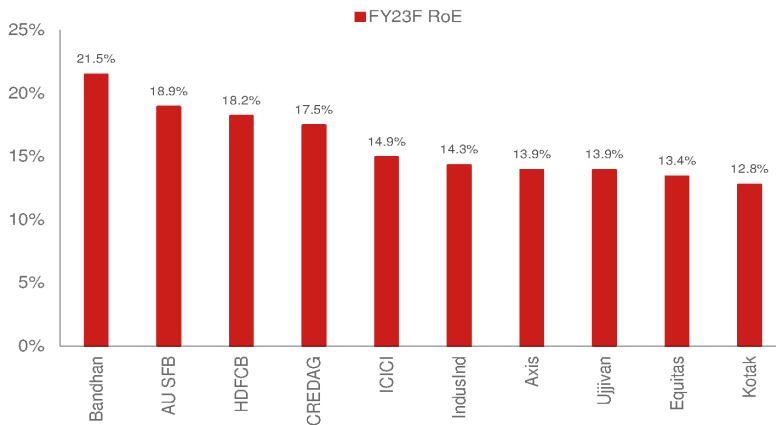
Source: Company data, Nomura estimates

Fig. 197: We value Bandhan Bank at INR490/ share based on a 3.3x FY23F book multiple

Valuation Summary	
FY23F RoE	21.5%
Mar-22 PT	490
Implied Mar-23F P/B	3.3
Implied Mar-23F P/E	16.6
Mar-23F BVPS	149
Mar-23F EPS	30

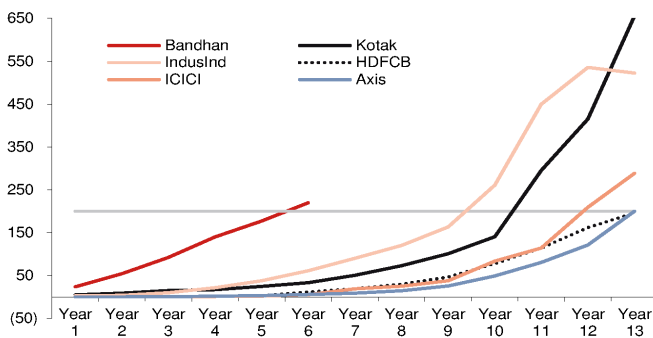
Source: Company data, Nomura estimates

Fig. 198: We expect Bandhan to deliver best-in-class normalized RoEs by FY23F



Source: Company data, Nomura estimates

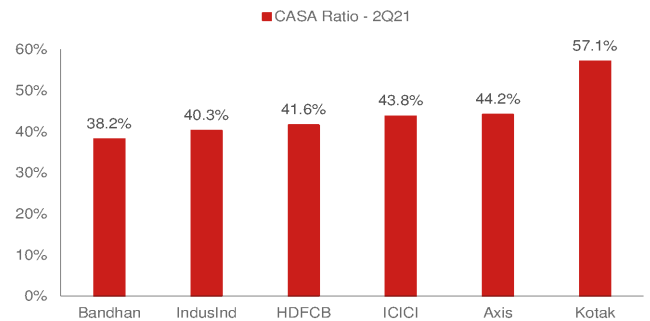
Fig. 199: Bandhan has scaled to INR200bn SA deposits within 5.5 years of becoming a bank vs top pvt banks taking >10 years



Note: For IndusInd, we have considered Year 1 as FY07-08, the year in which new management under the leadership of Mr. Sobti was appointed.

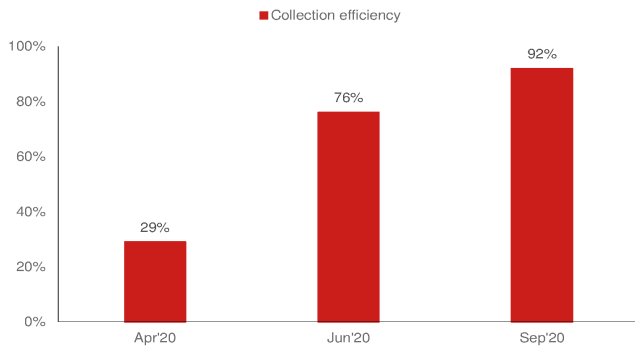
Source: Company data, Nomura research

Fig. 200: Strong CASA performance for Bandhan



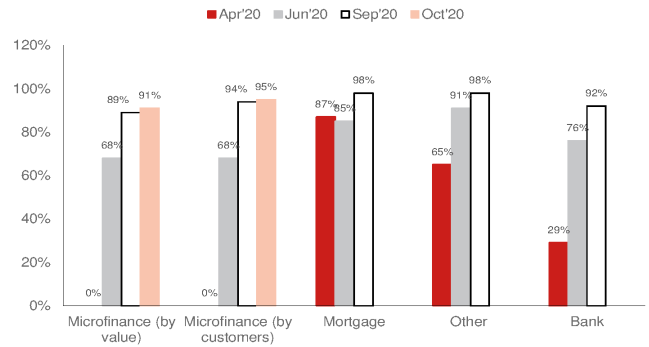
Source: Company data, Nomura research

Fig. 201: Collection efficiency improves to 92% in September (overall basis)



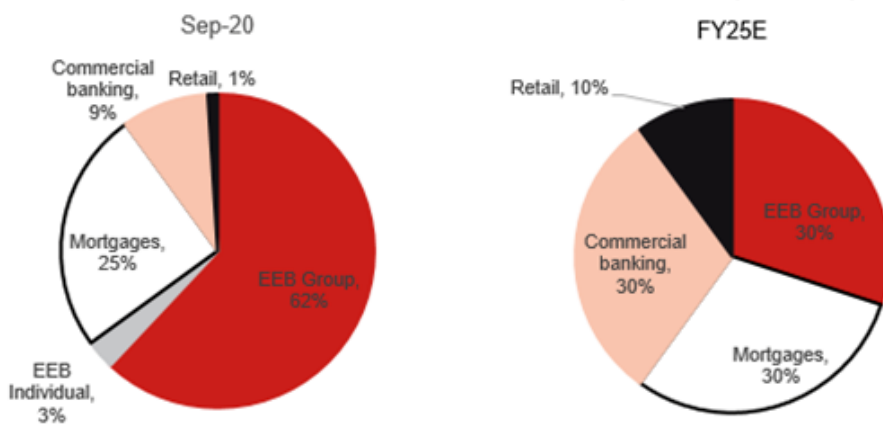
Source: Company data, Nomura research

Fig. 202: Product-wise collection efficiency trends: m/m improvement in micro-banking takes a pause in October



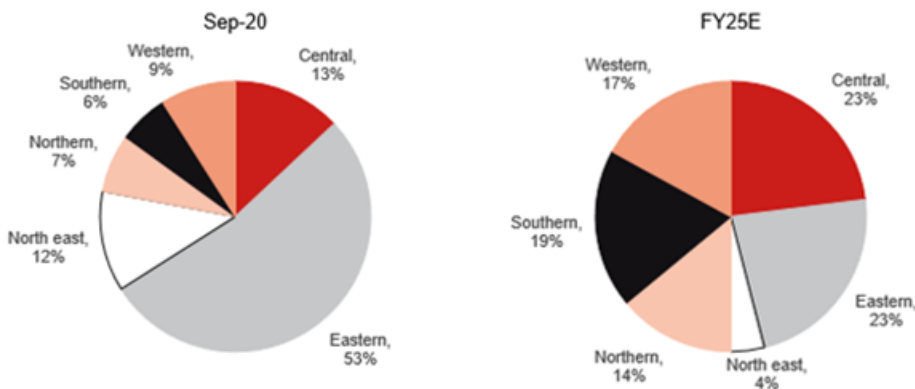
Source: Company data, Nomura research

Fig. 203: 5-year plan: Targeting a more balanced product mix with EEB (Microfinance) reducing to 30% from >60% currently



Note: EEB – Emerging entrepreneurs business; FY25F commercial banking portfolio includes EEB Individual book
Source: Company data, Nomura research

Fig. 204: 3x increase in bank branches planned: East + North east concentration to reduce from 65% currently to 27% by FY25E



Source: Company data, Nomura research

Equitas Holdings EQHL.NS EQUITAS IN

EQUITY: FINANCIALS

Probability of dual structure removal higher now Reiterate Buy on undemanding valuations and lower holdco discount

Action: Assuming lower holdco discount now; TP increased to INR95

With the recent RBI discussion paper ([link](#)) on harmonising banking guidelines, we see a higher probability of holdco discounts reducing: (1) **Proposal to remove NOFHC (Non-operative financial holding company) structure with no other business interest** – while SFB (small finance bank) holdcos are not registered as NOFHCs, we now see a higher probability of RBI permitting a reverse merger as these holdcos have no other operational businesses; (2) **Dilution overhang reduces** - we see supply risks and any merger/acquisition risks to reduce materially as the discussion paper no more requires promoter stake to come down to 40% within 5 years (26% cap in 15 years), and also interim dilution targets between 5-15 years are proposed to be removed.

Fundamentally, we think SFBs are not the best positioned to absorb COVID-19 impact, as regulatory and branch banking requirements continue to weigh on core profitability. That said, we think valuations adequately reflect higher risks. For SFBs, technical overhangs have dragged stock performance in the past 2 years and with increasing probability of these overhangs going away, we now assign a lower holdco discount (20% vs 40% earlier). While the market is still awaiting better clarity, we find risk-reward favorable to play for reducing holdco discount as valuations remain reasonable and growth/ asset quality recovery is better than we had expected ([link](#)).

Strong bounce-back in growth momentum and collections

Collection efficiency bounced back to 87% in Oct 2020 (94% incl. arrears). Collections still lag in commercial-vehicle (CV) loans at 78% (88% incl. arrears), while those in MFI (91%) are in line with peers. In small-business loans, collections improved to 88% (103% incl. arrears), with near normalization in the 0DPD bucket. Business momentum also picked up pace, and while 2Q21 disbursements were still down 20% y-y, they picked up sharply q/q. Liabilities too registered a sharp improvement with CASA improving 370bp q-q to 17% (on liabilities).

Market still not assigning lower holdco discounts

Holdco discounts (27% based on current prices) have come-off highs, but remain elevated given further clarity is required, in our view. However, we think the increasing probability of a reverse merger being allowed and reasonable valuations at 0.8x FY23F book limit the downside risk. We hence re-iterate Buy and assign a lower holdco discount of 20%. We further roll over to FY23F and value Equitas at 1.1x FY23F book for an ROE expectation of ~13% (FY23F).

Rating Remains	Buy
Target price Increased from INR 70	INR 95
Closing price 09 December 2020	INR 73
Implied upside	+30.1%
Market Cap (USD mn)	337.1
ADT (USD mn)	3.3

Research Analysts

India Banks

Amit Nanavati - NFASL
 amit.nanavati@nomura.com
 +91 22 403 74361

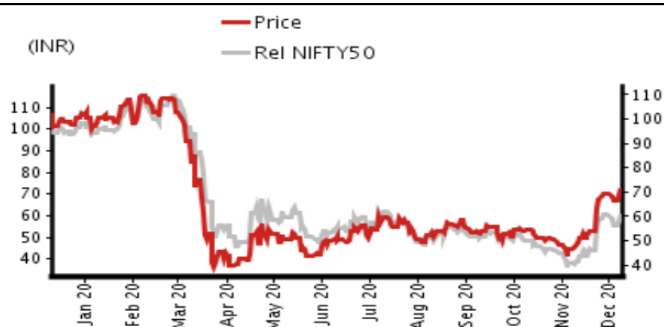
Tanuj Kyal, CFA - NFASL
 tanuj.kyal1@nomura.com
 +91 22 40374220

Year-end 31 Mar	FY20	FY21F		FY22F		FY23F	
Currency (INR)	Actual	Old	New	Old	New	Old	New
PPOP (mn)	5,976	8,059	8,059	9,137	9,137	11,211	11,211
Reported net profit (mn)	2,437	2,895	2,895	3,735	3,735	5,508	5,508
Normalised net profit (mn)	2,437	2,895	2,895	3,735	3,735	5,508	5,508
FD normalised EPS	7.14	8.48	8.48	10.94	10.94	16.13	16.13
FD norm. EPS growth (%)	15.4	18.8	18.8	29.0	29.0	47.5	47.5
FD normalised P/E (x)	10.2	-	8.6	-	6.6	-	4.5
Price/adj. book (x)	0.9	-	0.8	-	0.7	-	0.6
Price/book (x)	0.9	-	0.7	-	0.6	-	0.6
Dividend yield (%)	-	-	-	-	-	-	-
ROE (%)	9.7	9.3	9.3	10.3	10.3	13.4	13.4
ROA (%)	1.4	1.3	1.3	1.4	1.4	1.7	1.7

Source: Company data, Nomura estimates

Key Data on Equitas Holdings

Relative Performance Chart



Performance

(%)	1M	3M	12M		
Absolute (INR)	60.9	40.1	-34.4	M cap (USDm)	337.1
Absolute (USD)	62.1	40.0	-36.6	Free float (%)	85.7
Rel to NIFTY50	52.3	20.1	-47.7	3-mth ADT (USDm)	3.3

Profit and loss (INRmn)

Year-end 31 Mar	FY19	FY20	FY21F	FY22F	FY23F
Interest income	21,119	26,454	32,646	39,480	46,460
Interest expense	-9,602	-11,501	-14,721	-19,274	-22,175
Net interest income	11,517	14,953	17,925	20,206	24,284
Net fees and commissions	186	210	263	329	411
Trading related profits	33	34	41	53	68
Other operating revenue	2,610	2,579	2,227	3,374	4,123
Non-interest income	2,829	2,824	2,531	3,755	4,603
Operating income	14,346	17,777	20,456	23,962	28,887
Depreciation	-918	-965	-1,157	-1,389	-1,667
Amortisation	0	0	0	0	0
Operating expenses	-3,654	-3,738	-3,626	-4,533	-5,439
Employee share expense	-5,513	-7,098	-7,613	-8,903	-10,570
Pre-provision op profit	4,261	5,976	8,059	9,137	11,211
Provisions for bad debt	-890	-1,470	-4,589	-4,144	-3,848
Other provision charges	-134	-996	400	0	0
Operating profit	3,237	3,510	3,870	4,993	7,363
Other non-op income	0	0	0	0	0
Associates & JCEs	0	0	0	0	0
Pre-tax profit	3,237	3,510	3,870	4,993	7,363
Income tax	-1,132	-1,073	-975	-1,258	-1,855
Net profit after tax	2,106	2,437	2,895	3,735	5,508
Minority interests	0	0	0	0	0
Other items	0	0	0	0	0
Preferred dividends	0	0	0	0	0
Normalised NPAT	2,106	2,437	2,895	3,735	5,508
Extraordinary items	0	0	0	0	0
Reported NPAT	2,106	2,437	2,895	3,735	5,508
Dividends	0	0	0	0	0
Transfer to reserves	2,106	2,437	2,895	3,735	5,508

Growth (%)

Net interest income	33.8	29.8	19.9	12.7	20.2
Non-interest income	17.3	-0.2	-10.4	48.4	22.6
Non-interest expenses	31.3	2.3	-3.0	25.0	20.0
Pre-provision earnings	93.1	40.2	34.9	13.4	22.7
Net profit	561.5	15.7	18.8	29.0	47.5
Normalised EPS	561.5	15.4	18.8	29.0	47.5
Normalised FDEPS	561.5	15.4	18.8	29.0	47.5
Loan growth	50.5	18.6	26.1	24.5	23.4
Interest earning assets	48.3	17.8	26.7	24.4	23.5
Interest bearing liabilities	20.4	22.7	35.8	15.1	19.4
Asset growth	18.5	22.5	34.3	12.7	17.8
Deposit growth	60.7	19.8	28.8	20.6	26.3

Source: Company data, Nomura estimates

Balance sheet (INRmn)

As at 31 Mar	FY19	FY20	FY21F	FY22F	FY23F
Cash and equivalents	8,579	21,560	28,649	17,233	10,841
Inter-bank lending	0	0	0	0	0
Deposits with central bank	4,027	3,809	5,730	6,893	8,673
Total securities	0	0	0	0	0
Other int earning assets	0	0	0	0	0
Gross loans	117,043	139,169	178,179	223,130	275,899
Less provisions	-1,093	-1,697	-4,870	-7,317	-9,589
Net loans	115,950	137,472	173,309	215,813	266,311
Long-term investments	23,445	23,425	43,476	47,032	54,707
Fixed assets	2,373	2,128	1,882	1,636	1,391
Goodwill	0	0	0	0	0
Other intangible assets	0	0	0	0	0
Other non IEAs	3,253	4,752	6,314	3,798	2,389
Total assets	157,627	193,145	259,361	292,407	344,311
Customer deposits	90,067	107,884	138,916	167,505	211,488
Bank deposits, CDs, debentures	2,800	5,030	2,200	2,200	2,200
Other int bearing liabilities	36,930	46,319	75,112	79,262	83,593
Total int bearing liabilities	129,798	159,233	216,228	248,966	297,281
Non-int bearing liabilities	5,286	6,471	8,599	5,173	3,254
Total liabilities	135,084	165,704	224,827	254,139	300,535
Minority interest	0	0	0	0	0
Common stock	3,415	3,415	3,415	3,415	3,415
Preferred stock	0	0	0	0	0
Retained earnings	19,129	24,027	31,119	34,853	40,361
Reserves for credit losses	0	0	0	0	0
Proposed dividends	0	0	0	0	0
Other equity	0	0	0	0	0
Shareholders' equity	22,543	27,441	34,533	38,268	43,775
Total liabilities and equity	157,627	193,145	259,361	292,407	344,311
Non-perf assets	2,957	4,173	9,740	13,304	15,981

Balance sheet ratios (%)

Loans to deposits	130.0	129.0	128.3	133.2	130.5
Equity to assets	14.3	14.2	13.3	13.1	12.7

Asset quality & capital

NPAs/gross loans (%)	2.5	3.0	5.5	6.0	5.8
Bad debt charge/gross loans (%)	0.76	1.06	2.58	1.86	1.39
Loss reserves/assets (%)	0.69	0.88	1.88	2.50	2.78
Loss reserves/NPAs (%)	37.0	40.7	50.0	55.0	60.0
Tier 1 capital ratio (%)	20.9	22.4	22.8	20.4	19.1
Total capital ratio (%)	22.4	23.6	23.7	21.4	20.1

Per share

Reported EPS (INR)	6.19	7.14	8.48	10.94	16.13
Norm EPS (INR)	6.19	7.14	8.48	10.94	16.13
FD norm EPS (INR)	6.19	7.14	8.48	10.94	16.13
DPS (INR)	0.00	0.00	0.00	0.00	0.00
PPOP PS (INR)	12.52	17.50	23.60	26.76	32.83
BVPS (INR)	66.02	80.37	101.13	112.07	128.20
ABVPS (INR)	63.16	76.78	95.43	106.23	123.52
NTAPS (INR)	66.02	80.37	101.13	112.07	128.20

Valuations and ratios

Reported P/E (x)	11.7	10.2	8.6	6.6	4.5
Normalised P/E (x)	11.7	10.2	8.6	6.6	4.5
FD normalised P/E (x)	11.7	10.2	8.6	6.6	4.5
Dividend yield (%)	-	-	-	-	-
Price/book (x)	1.1	0.9	0.7	0.6	0.6
Price/adjusted book (x)	1.1	0.9	0.8	0.7	0.6
Net interest margin (%)	11.47	11.45	11.19	10.06	9.76
Yield on assets (%)	21.02	20.25	20.38	19.65	18.67
Cost of int bearing liab (%)	8.08	7.96	7.84	8.29	8.12
Net interest spread (%)	12.94	12.29	12.54	11.37	10.55
Non-interest income (%)	19.7	15.9	12.4	15.7	15.9
Cost to income (%)	70.3	66.4	60.6	61.9	61.2
Effective tax rate (%)	35.0	30.6	25.2	25.2	25.2
Dividend payout (%)	0.0	0.0	0.0	0.0	0.0
ROE (%)	9.8	9.7	9.3	10.3	13.4
ROA (%)	1.45	1.39	1.28	1.35	1.73
Operating ROE (%)	15.1	14.0	12.5	13.7	17.9
Operating ROA (%)	2.23	2.00	1.71	1.81	2.31

Source: Company data, Nomura estimates

Fig. 205: We value Equitas Holdings at INR95 based on 1.1x FY23F book and lower holdco discount (20% vs 40% earlier)

Equitas SFB (opco)	FY20	FY21F	FY22F	FY23F
Networth	27,441	34,533	38,268	43,775
BVPS	26.1	29.3	32.4	37.1
ROE	9.7%	9.3%	10.3%	13.4%
Target Multiple	1.1	1.1	1.1	1.1
Fair value	29	32	36	40
Listed price	33.4	33.4	33.4	33.4
Implied multiple	1.28	1.14	1.03	0.90

Equitas Holdco	FY20	FY21F	FY22F	FY23F
Stake in Bank	82%	82%	82%	82%
Fair value (per Holdco share - pre holdco disc)	81	91	101	114
Holdco discount	20%	20%	20%	25%
Fair value (per holdco share - post holdco disc)	65	73	81	86
Standalone BVPS (adj for subs invst)		4.2	4.2	4.2
Implied Value	65	77	85	90

Holdco discount working	AT LTP
Holdco discount	27%
Equitas holdco (fair price)	90
Equitas holdco (Listed price)	73

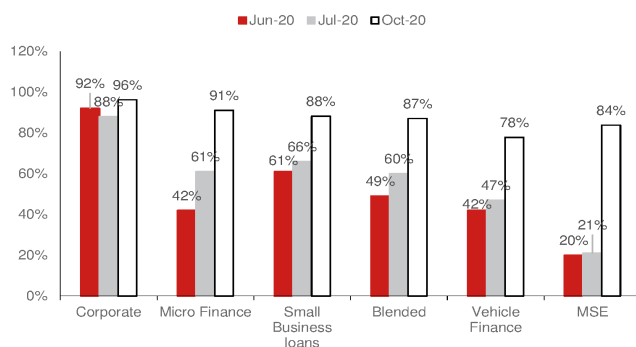
Source: Company data, Nomura estimates

Fig. 206: Expect RoEs to recover to 10-13% over FY22-23F

ROA decomposition	FY14	FY15	FY16	FY17	FY18	FY19	FY20	FY21F	FY22F	FY23F
Net Interest Income/Assets	10.80%	10.55%	10.15%	6.20%	8.20%	8.05%	8.41%	7.78%	7.35%	7.62%
Fees/Assets	1.29%	1.39%	1.32%	2.51%	2.40%	1.96%	1.57%	1.08%	1.35%	1.42%
Investment profits/Assets	0.07%	0.13%	0.01%	0.19%	-0.10%	0.02%	0.02%	0.02%	0.02%	0.02%
Net revenues/Assets	12.16%	12.07%	11.48%	8.90%	10.50%	10.03%	10.00%	8.88%	8.72%	9.06%
Operating Expense/Assets	-6.69%	-6.47%	-6.08%	-5.91%	-8.40%	-7.05%	-6.64%	-5.38%	-5.39%	-5.55%
Provisions/Assets	-0.76%	-1.32%	-1.00%	-1.12%	-1.64%	-0.72%	-1.39%	-1.82%	-1.51%	-1.21%
Taxes/Assets	-1.64%	-1.48%	-1.57%	-0.66%	-0.16%	-0.79%	-0.60%	-0.42%	-0.46%	-0.58%
Total Costs/Assets	-9.10%	-9.27%	-8.65%	-7.69%	-10.19%	-8.56%	-8.63%	-7.62%	-7.36%	-7.34%
ROA	3.07%	2.80%	2.83%	1.21%	0.30%	1.47%	1.37%	1.26%	1.36%	1.73%
Equity/Assets	25.11%	25.04%	21.24%	19.42%	19.32%	15.02%	14.06%	13.45%	13.24%	12.87%
ROE	12.21%	11.18%	13.31%	6.21%	1.57%	9.80%	9.75%	9.34%	10.26%	13.43%
RORWA	3.74%	3.30%	3.30%	1.81%	0.51%	2.49%	2.30%	2.28%	2.34%	2.79%
LLP/average loans	0.93%	1.55%	1.17%	1.64%	2.20%	0.89%	1.09%	2.51%	2.07%	1.56%
Core PPOP	5.40%	5.47%	5.38%	2.79%	2.20%	2.96%	3.34%	3.48%	3.30%	3.50%

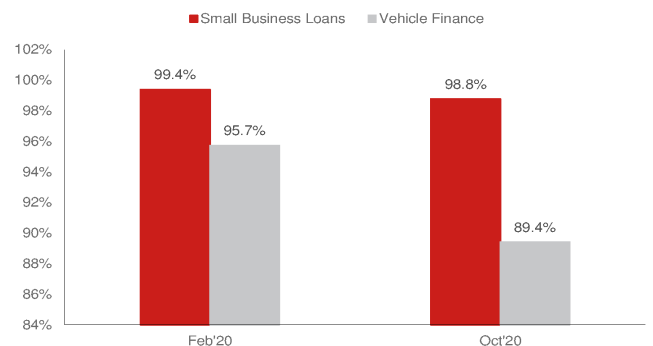
Source: Company data, Nomura estimates

Fig. 207: Overall collections improve to 87% (94% incl. arrears): CV still weak at 78%, while MFI in line with peers at 91%



Source: Company data, Nomura research

Fig. 208: 0Dpd buckets nearing normalized levels



Source: Company data, Nomura research

Key risks: Inability to sustain current improvement in collections and slower-than-expected pickup in growth momentum are key downside risks.

EQUITY: FINANCIALS

Probability of dual structure removal higher now Upgrade to Buy on lower holdco discount and comfortable capital position; raise TP to INR360

Action: Assuming lower holdco discount now; TP increased to INR360

With the recent RBI discussion paper ([link](#)) on harmonising banking guidelines, we see a higher probability of holdco discounts reducing: (1) **Proposal to remove NOFHC (non-operative financial holding company) structure with no other business interest** – while SFB (small finance bank) holdcos are not registered as NOFHCs, we now see a higher probability of RBI permitting a reverse merger as these holdcos have no other operational businesses; (2) **Dilution overhang reduces** - we expect supply risks and any merger/acquisition risks to reduce materially as the discussion paper no more requires promoter stake to come down to 40% within 5 years (26% cap in 15 years), and also interim dilution targets between 5-15 years are proposed to be removed.

Fundamentally, we think SFBs are not the best positioned to absorb COVID-19 impact, as regulatory and branch banking requirements continue to weigh on core profitability. That said, we think valuations adequately reflect higher risks. For SFBs, technical overhangs have dragged stock performance in the past 2 years and with increasing probability of these overhangs going away, we now assign a lower holdco discount (20% vs 40% earlier). While the market is still awaiting better clarity, we find risk-reward favorable to play for reducing holdco discount as valuations remain reasonable and growth/ asset quality recovery is better than we had expected ([link](#)).

Strong capital position to provide comfort

Oct collections at 88% (93% including arrears) (84% in Sep) and 78% collection efficiency in stressed states (30% of MFI AUM) reflect higher stress in the MFI book, but COVID-19 provision at 2.2% of AUM (2.9% of MFI AUM) gives some comfort. Overall, we remain circumspect on SFBs' ability to navigate the current crisis, given relatively lower PPOP/AUM at ~4.5%—ability to absorb impact is lower. That said, 2.9% COVID-19 provisions on MFI and strong capital position (Tier-1: 30%) provides comfort.

Markets still not assigning lower holdco discounts

Holdco discounts (39% based on current prices) have come off their highs but still remain elevated given further clarity required, in our view. But we think increasing probability of a reverse merger being allowed and reasonable valuations at 1.2x FY23F book limit the downside risk. Hence, we reiterate our Buy stance and assign a lower holdco discount of 20%. We roll over to FY23F and value Ujjivan at 1.5x FY23F book for an ROE expectation of 14% (FY23F).

Year-end 31 Mar	FY20		FY21F		FY22F		FY23F	
Currency (INR)	Actual	Old	New	Old	New	Old	New	
PPOP (mn)	6,372	8,874	8,874	9,624	9,624	11,966	11,966	
Reported net profit (mn)	3,499	2,701	2,701	4,020	4,020	5,698	5,698	
Normalised net profit (mn)	3,499	2,701	2,701	4,020	4,020	5,698	5,698	
FD normalised EPS	28.88	22.29	22.29	33.18	33.18	47.03	47.03	
FD norm. EPS growth (%)	75.2	-22.8	-22.8	48.8	48.8	41.7	41.7	
FD normalised P/E (x)	9.9	-	12.8	-	8.6	-	6.1	
Price/adj. book (x)	1.1	-	1.0	-	0.9	-	0.8	
Price/book (x)	1.1	-	1.0	-	0.9	-	0.8	
Dividend yield (%)	-	-	0.6	-	0.6	-	0.6	
ROE (%)	14.6	8.2	8.2	11.1	11.1	13.9	13.9	
ROA (%)	2.2	1.4	1.4	1.8	1.8	2.1	2.1	

Source: Company data, Nomura estimates

Rating	Buy
Up from Neutral	
Target price	INR 360
Increased from INR 250	
Closing price	INR 286
09 December 2020	
Implied upside	+25.9%
Market Cap (USD mn)	472.4
ADT (USD mn)	2.9

Research Analysts

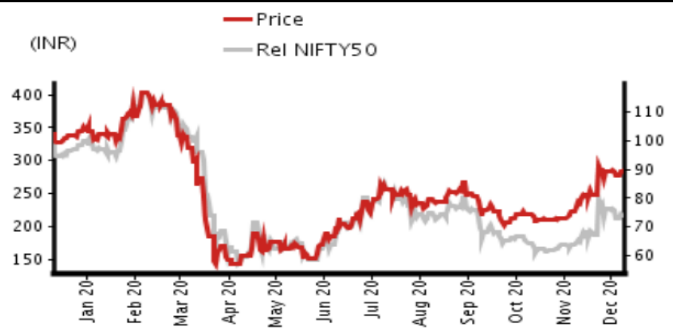
India Banks

Amit Nanavati - NFASL
 amit.nanavati@nomura.com
 +91 22 403 74361

Tanuj Kyal, CFA - NFASL
 tanuj.kyal1@nomura.com
 +91 22 40374220

Key Data on Ujjivan Financial Services

Relative Performance Chart



Performance

(%)	1M	3M	12M		
Absolute (INR)	24.2	30.2	-17.7	M cap (USDmnn)	472.4
Absolute (USD)	25.2	30.2	-20.4	Free float (%)	55.9
Rel to NIFTY50	15.7	10.2	-31.0	3-mth ADT (USDmnn)	2.9

Profit and loss (INRmn)

Year-end 31 Mar	FY19	FY20	FY21F	FY22F	FY23F
Interest income	18,316	27,036	30,231	34,906	42,463
Interest expense	-7,252	-10,700	-11,260	-12,709	-15,309
Net interest income	11,064	16,336	18,971	22,197	27,154
Net fees and commissions	1,110	1,670	1,045	1,435	1,733
Trading related profits	97	146	189	208	229
Other operating revenue	853	1,406	1,498	1,798	2,309
Non-interest income	2,060	3,222	2,732	3,441	4,271
Operating income	13,124	19,557	21,704	25,638	31,425
Depreciation	-606	-1,436	-1,723	-2,068	-2,481
Amortisation	0	0	0	0	0
Operating expenses	-4,240	-4,564	-3,880	-5,043	-6,304
Employee share expense	-5,188	-7,185	-7,227	-8,902	-10,673
Pre-provision op profit	3,090	6,372	8,874	9,624	11,966
Provisions for bad debt	-406	-1,710	-5,263	-4,250	-4,348
Other provision charges	0	0	0	0	0
Operating profit	2,684	4,662	3,611	5,374	7,618
Other non-op income	0	0	0	0	0
Associates & JCEs	0	0	0	0	0
Pre-tax profit	2,684	4,662	3,611	5,374	7,618
Income tax	-692	-1,163	-910	-1,354	-1,920
Net profit after tax	1,992	3,499	2,701	4,020	5,698
Minority interests	0	0	0	0	0
Other items	0	0	0	0	0
Preferred dividends	0	0	0	0	0
Normalised NPAT	1,992	3,499	2,701	4,020	5,698
Extraordinary items	0	0	0	0	0
Reported NPAT	1,992	3,499	2,701	4,020	5,698
Dividends	-264	0	-207	-207	-207
Transfer to reserves	1,728	3,499	2,493	3,812	5,491

Growth (%)

Net interest income	29.1	47.6	16.1	17.0	22.3
Non-interest income	82.2	56.4	-15.2	25.9	24.1
Non-interest expenses	73.7	7.7	-15.0	30.0	25.0
Pre-provision earnings	-3.4	106.2	39.3	8.5	24.3
Net profit	2,668.9	75.6	-22.8	48.8	41.7
Normalised EPS	2,634.8	75.2	-22.8	48.8	41.7
Normalised FDEPS	2,634.8	75.2	-22.8	48.8	41.7
Loan growth	43.9	33.1	8.7	24.2	21.5
Interest earning assets	47.2	35.2	5.8	23.3	20.9
Interest bearing liabilities	50.1	25.4	8.6	23.9	22.5
Asset growth	45.1	34.0	8.6	21.5	21.0
Deposit growth	95.6	46.1	15.0	25.0	30.0

Source: Company data, Nomura estimates

Balance sheet (INRmn)

As at 31 Mar	FY19	FY20	FY21F	FY22F	FY23F
Cash and equivalents	3,566	1,184	1,359	1,693	2,194
Inter-bank lending	0	0	0	0	0
Deposits with central bank	7,379	12,249	8,818	9,418	10,173
Total securities	0	0	0	0	0
Other int earning assets	0	0	0	0	0
Gross loans	106,228	141,533	157,158	196,009	238,432
Less provisions	-703	-1,097	-4,494	-6,380	-7,948
Net loans	105,525	140,436	152,664	189,629	230,484
Long-term investments	15,266	23,961	30,235	34,534	42,728
Fixed assets	2,845	3,005	3,165	3,325	3,486
Goodwill	0	0	0	0	0
Other intangible assets	0	0	0	0	0
Other non IEAs	2,842	3,277	3,768	4,334	4,984
Total assets	137,422	184,112	200,010	242,934	294,049
Customer deposits	73,794	107,805	123,976	154,969	201,460
Bank deposits, CDs, debentures	4,500	2,000	2,000	2,000	2,000
Other int bearing liabilities	39,161	37,533	34,031	41,304	39,466
Total int bearing liabilities	117,455	147,338	160,007	198,273	242,926
Non-int bearing liabilities	3,771	4,898	5,632	6,477	7,449
Total liabilities	121,226	152,235	165,639	204,751	250,375
Minority interest	0	0	0	0	0
Common stock	1,212	1,212	1,212	1,212	1,212
Preferred stock	0	0	0	0	0
Retained earnings	14,985	30,666	33,159	36,971	42,462
Reserves for credit losses	0	0	0	0	0
Proposed dividends	0	0	0	0	0
Other equity	0	0	0	0	0
Shareholders' equity	16,196	31,877	34,371	38,183	43,674
Total liabilities and equity	137,422	184,112	200,010	242,934	294,049
Non-perf assets	979	1,371	5,617	7,975	9,935

Balance sheet ratios (%)

Loans to deposits	144.0	131.3	126.8	126.5	118.4
Equity to assets	11.8	17.3	17.2	15.7	14.9

Asset quality & capital

NPAs/gross loans (%)	0.9	1.0	3.6	4.1	4.2
Bad debt charge/gross loans (%)	0.38	1.21	3.35	2.17	1.82
Loss reserves/assets (%)	0.51	0.60	2.25	2.63	2.70
Loss reserves/NPAs (%)	71.8	80.0	80.0	80.0	80.0
Tier 1 capital ratio (%)	18.4	28.0	31.0	27.6	25.9
Total capital ratio (%)	18.9	28.8	31.8	29.6	28.6

Per share

Reported EPS (INR)	16.48	28.88	22.29	33.18	47.03
Norm EPS (INR)	16.48	28.88	22.29	33.18	47.03
FD norm EPS (INR)	16.48	28.88	22.29	33.18	47.03
DPS (INR)	2.18	0.00	1.71	1.71	1.71
PPOP PS (INR)	25.57	52.59	73.24	79.43	98.75
BVPS (INR)	133.67	263.09	283.66	315.13	360.44
ABVPS (INR)	133.67	263.09	283.66	315.13	360.44
NTAPS (INR)	133.67	263.09	283.66	315.13	360.44

Valuations and ratios

Reported P/E (x)	17.3	9.9	12.8	8.6	6.1
Normalised P/E (x)	17.3	9.9	12.8	8.6	6.1
FD normalised P/E (x)	17.3	9.9	12.8	8.6	6.1
Dividend yield (%)	0.8	-	0.6	0.6	0.6
Price/book (x)	2.1	1.1	1.0	0.9	0.8
Price/adjusted book (x)	2.1	1.1	1.0	0.9	0.8
Net interest margin (%)	11.67	12.30	12.08	12.31	12.35
Yield on assets (%)	19.32	20.36	19.25	19.36	19.31
Cost of int bearing liab (%)	7.41	8.08	7.33	7.09	6.94
Net interest spread (%)	11.91	12.28	11.92	12.27	12.37
Non-interest income (%)	15.7	16.5	12.6	13.4	13.6
Cost to income (%)	76.5	67.4	59.1	62.5	61.9
Effective tax rate (%)	25.8	25.0	25.2	25.2	25.2
Dividend payout (%)	13.3	0.0	7.7	5.2	3.6
ROE (%)	13.0	14.6	8.2	11.1	13.9
ROA (%)	1.72	2.18	1.41	1.82	2.12
Operating ROE (%)	17.5	19.4	10.9	14.8	18.6
Operating ROA (%)	2.31	2.90	1.88	2.43	2.84

Source: Company data, Nomura estimates

Fig. 209: We value Ujjivan Financial Services at INR360/ share based on 1.5x FY23F book multiple and lower holdco discount (20% v/s 40% earlier)

Ujjivan SFB (opco)	FY20	FY21F	FY22F	FY23F
Networth	31,877	34,371	38,183	43,674
BVPS	18.45	19.89	22.09	25.27
ROE	14.6%	8.2%	11.1%	13.9%
Target Multiple	1.50	1.50	1.50	1.50
Fair value	27.7	29.8	33.1	37.9
Listed price	39.4	39.4	39.4	39.4
Implied multiple	2.13	1.98	1.78	1.56

Ujjivan Holdco	FY20	FY21F	FY22F	FY23F
Stake in Bank	83.3%	83.3%	83.3%	83.3%
Fair value (per Holdco share - pre holdco disc)	329	355	394	450
Holdco discount	20%	20%	20%	20%
Fair value (Holdco - post holdco disc)	263	284	315	360

Holdco discount working	At LTP
Holdco discount	39%
Ujjivan holdco (fair price)	360
Ujjivan holdco (Listed price)	286

Note: Priced as at close of markets on 9 December 2020

Source: Company data, Nomura estimates

Fig. 210: We expect RoEs to recover to 11-14% over FY22-23F

ROA decomposition	FY15	FY16	FY17	FY18	FY19	FY20	FY21F	FY22F	FY23F
Net Interest Income/Assets	10.39%	11.01%	10.44%	10.00%	9.95%	10.55%	10.23%	10.36%	10.43%
Fees/Assets	1.75%	1.55%	1.88%	1.25%	1.78%	1.99%	1.37%	1.51%	1.55%
Investment profits/Assets	0.16%	0.19%	0.22%	0.07%	0.08%	0.09%	0.10%	0.10%	0.09%
Net revenues/Assets	12.30%	12.75%	12.54%	11.32%	11.80%	12.64%	11.70%	11.97%	12.07%
Operating Expense/Assets	-7.40%	-6.48%	-6.72%	-7.59%	-9.02%	-8.52%	-6.92%	-7.48%	-7.47%
Provisions/Assets	-0.76%	-0.53%	-1.10%	-3.63%	-0.37%	-1.10%	-2.84%	-1.98%	-1.67%
Taxes/Assets	-1.40%	-2.00%	-1.67%	-0.02%	-0.62%	-0.75%	-0.49%	-0.63%	-0.74%
Total Costs/Assets	-9.56%	-9.01%	-9.49%	-11.24%	-10.01%	-10.37%	-10.25%	-10.09%	-9.88%
ROA	2.74%	3.74%	3.05%	0.08%	1.79%	2.26%	1.46%	1.88%	2.19%
Equity/Assets	20.03%	20.41%	21.66%	18.68%	13.79%	15.53%	17.86%	16.94%	15.72%
ROE	13.67%	18.32%	14.06%	0.45%	12.99%	14.56%	8.15%	11.08%	13.92%
RORWA			2.89%	0.10%	2.55%	3.54%	2.41%	3.09%	3.56%
LLP/average loans	0.86%	0.58%	1.28%	4.46%	0.44%	1.36%	3.58%	2.48%	2.07%
Core PPOP	4.74%	6.09%	5.61%	3.66%	2.70%	4.02%	4.68%	4.40%	4.51%

Source: Company data, Nomura estimates

Fig. 211: Overall collections (excl. arrears) up to 88%; MFI/MSE still lagging

Loan segment	% of total book	Collection efficiency % (ex additional EMIs/ pre-closures)							
		Mar-20	Apr-20	May-20	Jun-20	Jul-20	Aug-20	Sep-20	Oct-20
MicroBanking	74.5%	93%	2%	14%	53%	60%	68%	83%	88%
MSE	7.6%	82%	19%	17%	46%	60%	58%	76%	81%
Affordable Housing	11.8%	94%	32%	33%	52%	67%	71%	92%	93%
Personal Loan	NA	91%	44%	38%	62%	62%	62%	79%	88%
Vehicle Loans	NA	95%	33%	23%	67%	72%	68%	92%	91%
FIG Lending	3.6%	100%	77%	67%	86%	100%	100%	100%	100%
Total		93%	5%	16%	54%	61%	69%	84%	88%

Source: Company data, Nomura research

Fig. 212: Maharashtra, West-Bengal, Assam and Punjab collections still lagging at 78% (30% of MFI AUM); other states' MFI collections at 91%

State	Exposure INRbn	% of total MFI book	Collections %			
			June	July	Sep	Oct
Maharashtra	8.1	7.9%	27%	27%	71%	79%
West Bengal	15.7	15.2%	41%	52%	74%	78%
Assam	3.9	3.7%	39%	37%	70%	74%
Punjab	3.6	3.5%	NA	NA	78%	83%
Total MFI book	103.4					

Source: Company data, Nomura research

Key risks: Inability to consistently improve collections and an extended slowdown are key downside risks.

Appendix A-1

Analyst Certification

We, Amit Nanavati and Tanuj Kyal, hereby certify (1) that the views expressed in this Research report accurately reflect our personal views about any or all of the subject securities or issuers referred to in this Research report, (2) no part of our compensation was, is or will be directly or indirectly related to the specific recommendations or views expressed in this Research report and (3) no part of our compensation is tied to any specific investment banking transactions performed by Nomura Securities International, Inc., Nomura International plc or any other Nomura Group company.

Issuer Specific Regulatory Disclosures

The terms "Nomura" and "Nomura Group" used herein refers to Nomura Holdings, Inc. and its affiliates and subsidiaries, including Nomura Securities International, Inc. ('NSI'), U. S. registered broker dealers and members of SIPC.

Materially mentioned issuers

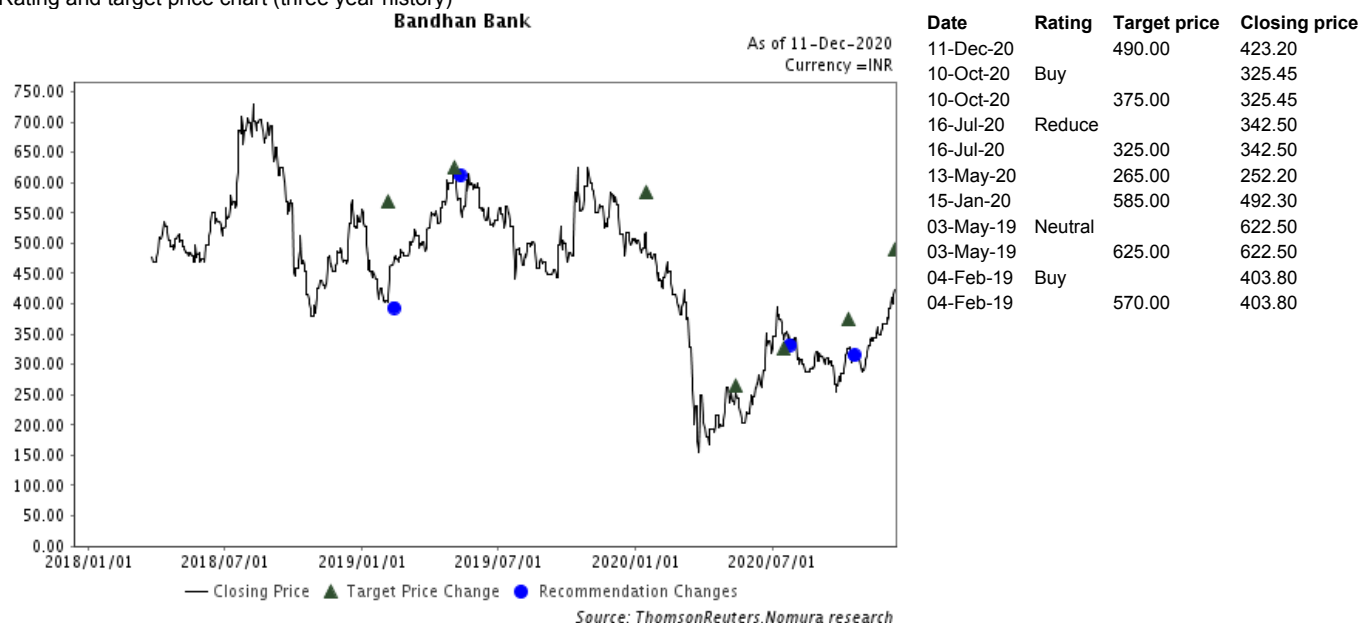
Issuer	Ticker	Price	Price date	Stock rating	Sector rating	Disclosures
Bandhan Bank	BANDHAN IN	INR 423.2	11-Dec-2020	Buy	N/A	
CreditAccess Grameen	CREDAG IN	INR 767.5	09-Dec-2020	Buy	N/A	A4,A5,A6,A7
Equitas Holdings	EQUITAS IN	INR 72.55	09-Dec-2020	Buy	N/A	
Ujjivan Financial Services	UJJIVAN IN	INR 285.6	09-Dec-2020	Buy	N/A	

- A4 The Nomura Group has had an investment banking services client relationship with the subject company during the past 12 months.
- A5 The Nomura Group has received compensation for investment banking services from the subject company in the past 12 months.
- A6 The Nomura Group expects to receive or intends to seek compensation for investment banking services from the subject company in the next three months.
- A7 The Nomura Group has managed or co-managed a public or private offering of the subject company's securities in the past 12 months.

Bandhan Bank (BANDHAN IN)

INR 423.2 (11-Dec-2020) Buy (Sector rating: N/A)

Rating and target price chart (three year history)



For explanation of ratings refer to the stock rating keys located after chart(s)

Valuation Methodology We value Bandhan Bank at INR490 based on 3.3x Mar-23F P/B. The benchmark index for this stock is Nifty 50.

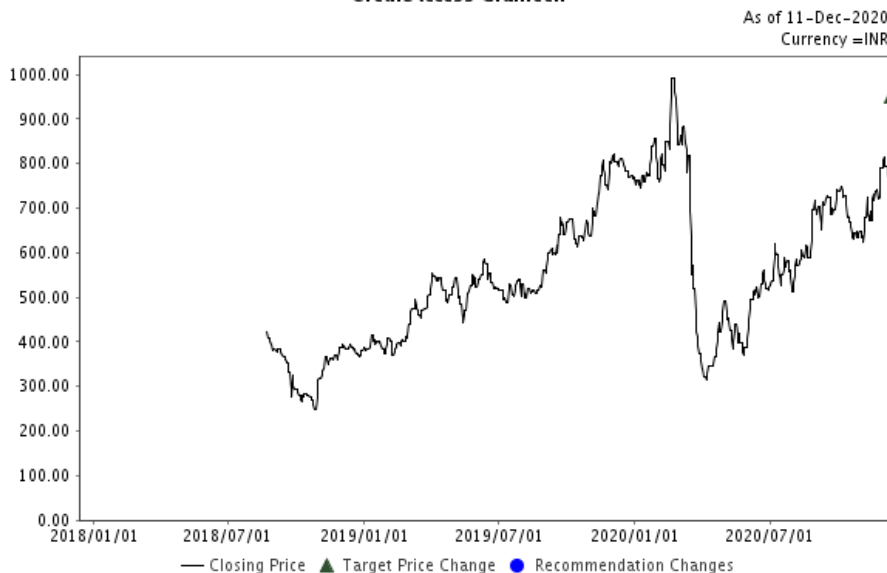
Risks that may impede the achievement of the target price Downside risks: Inability to maintain or improve collection efficiency from current levels and broader slowdown in economy are the key downside risks.

CreditAccess Grameen (CREDAG IN)

INR 767.5 (09-Dec-2020) Buy (Sector rating: N/A)

Rating and target price chart (three year history)

CreditAccess Grameen



Date	Rating	Target price	Closing price
11-Dec-20	Buy	950.00	784.60
11-Dec-20			784.60

As of 11-Dec-2020
Currency = INR

— Closing Price ▲ Target Price Change ● Recommendation Changes

Source: ThomsonReuters, Nomura research

For explanation of ratings refer to the stock rating keys located after chart(s)

Valuation Methodology We value CREDAG based on Residual income model to arrive at our target price of INR950 implying a 2.7x FY23F book multiple. We expect CREDAG to deliver 17-18% sustainably v/s cost of equity of 12-13%. The benchmark index is NIFTY50.

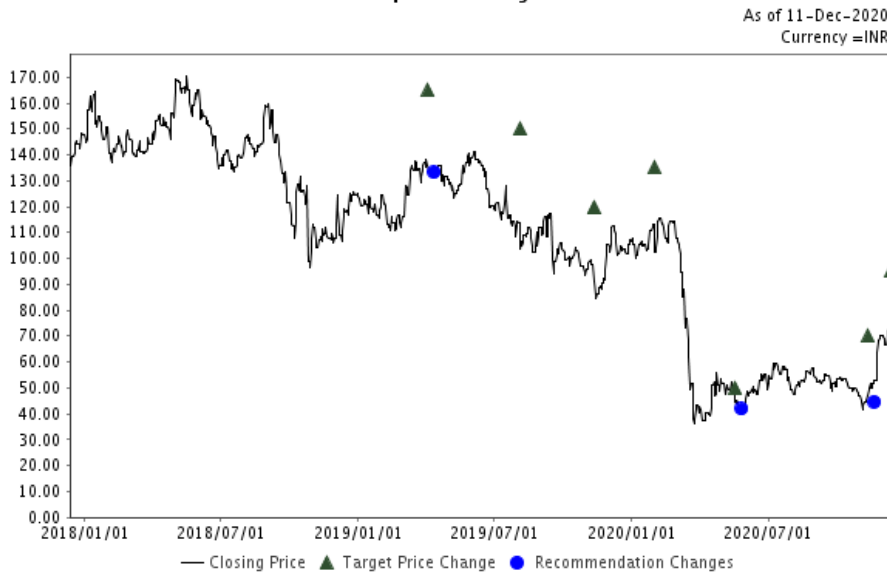
Risks that may impede the achievement of the target price Higher impact of COVID, inability to sustain current improvement in collections and concentration risks remains key risks.

Equitas Holdings (EQUITAS IN)

INR 72.55 (09-Dec-2020) Buy (Sector rating: N/A)

Rating and target price chart (three year history)

Equitas Holdings



Date	Rating	Target price	Closing price
11-Dec-20		95.00	68.90
11-Nov-20	Buy		46.95
11-Nov-20		70.00	46.95
18-May-20	Neutral		44.25
18-May-20		50.00	44.25
31-Jan-20		135.00	109.10
11-Nov-19		120.00	90.80
05-Aug-19		150.00	103.85
04-Apr-19	Buy		135.70
04-Apr-19		165.00	135.70

As of 11-Dec-2020
Currency = INR

— Closing Price ▲ Target Price Change ● Recommendation Changes

Source: ThomsonReuters, Nomura research

For explanation of ratings refer to the stock rating keys located after chart(s)

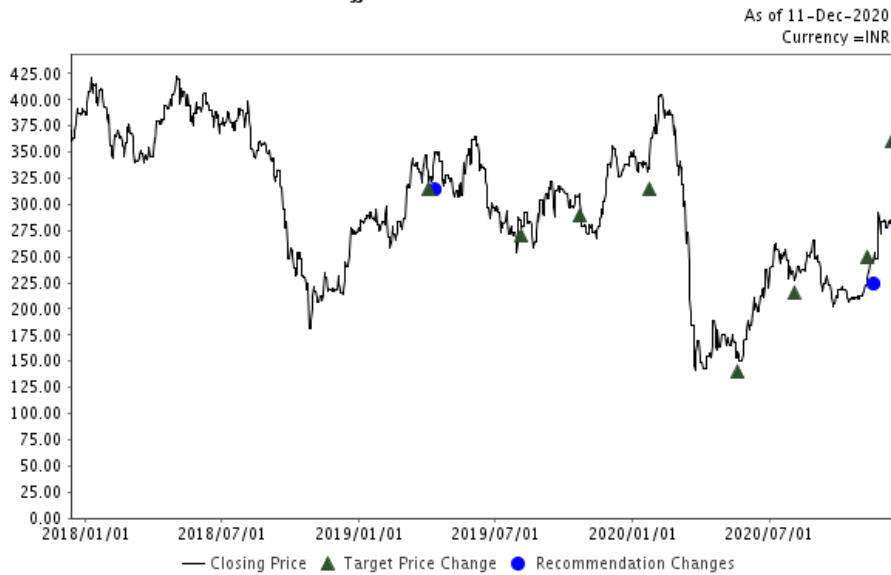
Valuation Methodology We value Equitas Holdco at INR95/share which implies a multiple of 1.1x on Mar-23F book. We assign a holdco discount of 20% of the firm value. The benchmark index is NIFTY50.

Risks that may impede the achievement of the target price Inability to sustain current improvement in collections and slow then expected pick-up in growth momentum is a key downside risk.

Ujjivan Financial Services (UJJIVAN IN)

INR 285.6 (09-Dec-2020) Buy (Sector rating: N/A)

Rating and target price chart (three year history)

Ujjivan Financial Services

Date	Rating	Target price	Closing price
11-Dec-20	Buy		282.85
11-Dec-20		360.00	282.85
09-Nov-20	Neutral		229.90
09-Nov-20		250.00	229.90
03-Aug-20		215.00	227.05
20-May-20		140.00	158.60
23-Jan-20		315.00	346.00
22-Oct-19		290.00	310.90
05-Aug-19		270.00	277.65
04-Apr-19	Reduce		319.95
04-Apr-19		315.00	319.95

For explanation of ratings refer to the stock rating keys located after chart(s)

Valuation Methodology We value Ujjivan at 1.5x Mar-23 book and assign 20% holdco discount to arrive at INR360/share and value the bank at INR38/share. Nifty 50 is the benchmark index for this stock.

Risks that may impede the achievement of the target price Inability to consistently improve collections and extended slow-down are key downside risks.

Rating and target price changes

Issuer	Ticker	Old Stock Rating	New Stock Rating	Old Target Price	New Target Price
Bandhan Bank	BANDHAN IN	Buy	Buy	INR 375	INR 490
CreditAccess Grameen	CREDAG IN	Not Rated	Buy	N/A	INR 950
Equitas Holdings	EQUITAS IN	Buy	Buy	INR 70	INR 95
Ujjivan Financial Services	UJJIVAN IN	Neutral	Buy	INR 250	INR 360

Important Disclosures**Online availability of research and conflict-of-interest disclosures**

Nomura Group research is available on www.nomuranow.com/research, Bloomberg, Capital IQ, Factset, Reuters and ThomsonOne. Important disclosures may be read at <http://go.nomuranow.com/research/globalresearchportal/pages/disclosures/disclosures.aspx> or requested from Nomura Securities International, Inc. If you have any difficulties with the website, please email grpsupport@nomura.com for help.

The analysts responsible for preparing this report have received compensation based upon various factors including the firm's total revenues, a portion of which is generated by Investment Banking activities. Unless otherwise noted, the non-US analysts listed at the front of this report are not registered/qualified as research analysts under FINRA rules, may not be associated persons of NSI, and may not be subject to FINRA Rule 2241 restrictions on communications with covered companies, public appearances, and trading securities held by a research analyst account.

Nomura Global Financial Products Inc. (NGFP) Nomura Derivative Products Inc. (NDP) and Nomura International plc. (Nlplc) are registered with the Commodities Futures Trading Commission and the National Futures Association (NFA) as swap dealers. NGFP, NDP, and Nlplc are generally engaged in the trading of swaps and other derivative products, any of which may be the subject of this report.

Distribution of ratings (Nomura Group)

The distribution of all ratings published by Nomura Group Global Equity Research is as follows:

51% have been assigned a Buy rating which, for purposes of mandatory disclosures, are classified as a Buy rating; 44% of companies with this rating are investment banking clients of the Nomura Group*. 0% of companies (which are admitted to trading on a regulated market in the EEA) with this rating were supplied material services** by the Nomura Group.

43% have been assigned a Neutral rating which, for purposes of mandatory disclosures, is classified as a Hold rating; 58% of companies with this rating are investment banking clients of the Nomura Group*. 0% of companies (which are admitted to trading on a regulated market in the EEA) with this rating were supplied material services by the Nomura Group

6% have been assigned a Reduce rating which, for purposes of mandatory disclosures, are classified as a Sell rating; 14% of companies with this rating are investment banking clients of the Nomura Group*. 0% of companies (which are admitted to trading on a regulated market in the EEA) with this rating were supplied material services by the Nomura Group.

As at 30 September 2020.

*The Nomura Group as defined in the Disclaimer section at the end of this report.

** As defined by the EU Market Abuse Regulation

Definition of Nomura Group's equity research rating system and sectors

The rating system is a relative system, indicating expected performance against a specific benchmark identified for each individual stock, subject to limited management discretion. An analyst's target price is an assessment of the current intrinsic fair value of the stock based on an appropriate valuation methodology determined by the analyst. Valuation methodologies include, but are not limited to, discounted cash flow analysis, expected return on equity and multiple analysis. Analysts may also indicate expected absolute upside/downside relative to the stated target price, defined as (target price - current price)/current price.

STOCKS

A rating of 'Buy', indicates that the analyst expects the stock to outperform the Benchmark over the next 12 months. A rating of 'Neutral', indicates that the analyst expects the stock to perform in line with the Benchmark over the next 12 months. A rating of 'Reduce', indicates that

the analyst expects the stock to underperform the Benchmark over the next 12 months. A rating of **'Suspended'**, indicates that the rating, target price and estimates have been suspended temporarily to comply with applicable regulations and/or firm policies. Securities and/or companies that are labelled as **'Not rated'** or shown as **'No rating'** are not in regular research coverage. Investors should not expect continuing or additional information from Nomura relating to such securities and/or companies. Benchmarks are as follows: **United States/Europe/Asia ex-Japan**: please see valuation methodologies for explanations of relevant benchmarks for stocks, which can be accessed at: <http://go.nomuranow.com/research/globalresearchportal/pages/disclosures/disclosures.aspx>; **Global Emerging Markets (ex-Asia)**: MSCI Emerging Markets ex-Asia, unless otherwise stated in the valuation methodology; **Japan**: Russell/Nomura Large Cap.

SECTORS

A **'Bullish'** stance, indicates that the analyst expects the sector to outperform the Benchmark during the next 12 months. A **'Neutral'** stance, indicates that the analyst expects the sector to perform in line with the Benchmark during the next 12 months. A **'Bearish'** stance, indicates that the analyst expects the sector to underperform the Benchmark during the next 12 months. Sectors that are labelled as **'Not rated'** or shown as **'N/A'** are not assigned ratings. Benchmarks are as follows: **United States**: S&P 500; **Europe**: Dow Jones STOXX 600; **Global Emerging Markets (ex-Asia)**: MSCI Emerging Markets ex-Asia. **Japan/Asia ex-Japan**: Sector ratings are not assigned.

Target Price

A Target Price, if discussed, indicates the analyst's forecast for the share price with a 12-month time horizon, reflecting in part the analyst's estimates for the company's earnings. The achievement of any target price may be impeded by general market and macroeconomic trends, and by other risks related to the company or the market, and may not occur if the company's earnings differ from estimates.

Disclaimers

This publication contains material that has been prepared by the Nomura Group entity identified on page 1 and, if applicable, with the contributions of one or more Nomura Group entities whose employees and their respective affiliations are specified on page 1 or identified elsewhere in this publication. The term "Nomura Group" used herein refers to Nomura Holdings, Inc. and its affiliates and subsidiaries including: (a) Nomura Securities Co., Ltd. ('NSC') Tokyo, Japan, (b) Nomura Financial Products Europe GmbH ('NFPE'), Germany, (c) Nomura International plc ('NIplc'), UK, (d) Nomura Securities International, Inc. ('NSI'), New York, US, (e) Nomura International (Hong Kong) Ltd. ('NIHK'), Hong Kong, (f) Nomura Financial Investment (Korea) Co., Ltd. ('NFIK'), Korea (Information on Nomura analysts registered with the Korea Financial Investment Association ('KOFIA') can be found on the KOFIA Intranet at <http://dis.kofia.or.kr>), (g) Nomura Singapore Ltd. ('NSL'), Singapore (Registration number 197201440E, regulated by the Monetary Authority of Singapore) (h) Nomura Australia Ltd. ('NAL'), Australia (ABN 48 003 032 513), regulated by the Australian Securities and Investment Commission ('ASIC') and holder of an Australian financial services licence number 246412, (i) Nomura Securities Malaysia Sdn. Bhd. ('NSM'), Malaysia, (j) NIHK, Taipei Branch ('NITB'), Taiwan, (k) Nomura Financial Advisory and Securities (India) Private Limited ('NFASL'), Mumbai, India (Registered Address: Ceejay House, Level 11, Plot F, Shivsagar Estate, Dr. Annie Besant Road, Worli, Mumbai- 400 018, India; Tel: 91 22 4037 4037, Fax: 91 22 4037 4111; CIN No: U74140MH2007PTC169116, SEBI Registration No. for Stock Broking activities : INZ000255633; SEBI Registration No. for Merchant Banking : INM000011419; SEBI Registration No. for Research: INH000001014. 'CNS Thailand' next to an analyst's name on the front page of a research report indicates that the analyst is employed by Capital Nomura Securities Public Company Limited ('CNS') to provide research assistance services to NSL under an agreement between CNS and NSL. 'NSFSPL' next to an employee's name on the front page of a research report indicates that the individual is employed by Nomura Structured Finance Services Private Limited to provide assistance to certain Nomura entities under inter-company agreements. 'Verdhana' next to an individual's name on the front page of a research report indicates that the individual is employed by PT Verdhana Sekuritas Indonesia ('Verdhana') to provide research assistance to NIHK under a research partnership agreement and neither Verdhana nor such individual is licensed outside of Indonesia. For the avoidance of doubt and for the purpose of disclosure, Nomura Orient International Securities Co., Ltd ('NOI'), a joint venture amongst Nomura Group, Orient International (Holding) Co., Ltd and Shanghai Huangpu Investment Holding (Group) Co., Ltd is excluded from the definition of Nomura Group. An individual name printed next to NOI on the front page of a research report indicates that individual is employed by NOI to provide research assistance to NIHK under a research partnership agreement and neither NOI or such individual is licensed outside of Mainland China, PRC. THIS MATERIAL IS: (I) FOR YOUR PRIVATE INFORMATION, AND WE ARE NOT SOLICITING ANY ACTION BASED UPON IT; (II) NOT TO BE CONSTRUED AS AN OFFER TO SELL OR A SOLICITATION OF AN OFFER TO BUY ANY SECURITIES IN ANY JURISDICTION WHERE SUCH OFFER OR SOLICITATION WOULD BE ILLEGAL; AND (III) OTHER THAN DISCLOSURES RELATING TO THE NOMURA GROUP, BASED UPON INFORMATION FROM SOURCES THAT WE CONSIDER RELIABLE, BUT HAS NOT BEEN INDEPENDENTLY VERIFIED BY NOMURA GROUP.

Other than disclosures relating to the Nomura Group, the Nomura Group does not warrant, represent or undertake, express or implied, that the document is fair, accurate, complete, correct, reliable or fit for any particular purpose or merchantable, and to the maximum extent permissible by law and/or regulation, does not accept liability (in negligence or otherwise, and in whole or in part) for any act (or decision not to act) resulting from use of this document and related data. To the maximum extent permissible by law and/or regulation, all warranties and other assurances by the Nomura Group are hereby excluded and the Nomura Group shall have no liability (in negligence or otherwise, and in whole or in part) for any loss howsoever arising from the use, misuse, or distribution of this material or the information contained in this material or otherwise arising in connection therewith.

Opinions or estimates expressed are current opinions as of the original publication date appearing on this material and the information, including the opinions and estimates contained herein, are subject to change without notice. The Nomura Group, however, expressly disclaims any obligation, and therefore is under no duty, to update or revise this document. Any comments or statements made herein are those of the author(s) and may differ from views held by other parties within Nomura Group. Clients should consider whether any advice or recommendation in this report is suitable for their particular circumstances and, if appropriate, seek professional advice, including tax advice. The Nomura Group does not provide tax advice.

The Nomura Group, and/or its officers, directors, employees and affiliates, may, to the extent permitted by applicable law and/or regulation, deal as principal, agent, or otherwise, or have long or short positions in, or buy or sell, the securities, commodities or instruments, or options or other derivative instruments based thereon, of issuers or securities mentioned herein. The Nomura Group companies may also act as market maker or liquidity provider (within the meaning of applicable regulations in the UK) in the financial instruments of the issuer. Where the activity of market maker is carried out in accordance with the definition given to it by specific laws and regulations of the US or other jurisdictions, this will be separately disclosed within the specific issuer disclosures.

This document may contain information obtained from third parties, including, but not limited to, ratings from credit ratings agencies such as Standard & Poor's. The Nomura Group hereby expressly disclaims all representations, warranties or undertakings of originality, fairness, accuracy, completeness, correctness, merchantability or fitness for a particular purpose with respect to any of the information obtained from third parties contained in this material or otherwise arising in connection therewith, and shall not be liable (in negligence or otherwise, and in whole or in part) for any direct, indirect, incidental, exemplary, compensatory, punitive, special or consequential damages, costs, expenses, legal fees, or losses (including lost income or profits and opportunity costs) in connection with any use or misuse of any of the information obtained from third parties contained in this material or otherwise arising in connection therewith. Reproduction and distribution of third-party content in any form is prohibited except with the prior written permission of the related third-party. Third-party content providers do not, express or implied, guarantee the fairness, accuracy, completeness, correctness, timeliness or availability of any information, including ratings, and are not in any way responsible for any errors or omissions (negligent or otherwise), regardless of the cause, or for the results obtained from the use or misuse of such content. Third-party content providers give no express or implied warranties, including, but not limited to, any warranties of merchantability or fitness for a particular purpose or use. Third-party content providers shall not be liable (in negligence or otherwise, and in whole or in part) for any direct, indirect, incidental, exemplary, compensatory, punitive, special or consequential damages, costs, expenses, legal fees, or losses (including lost income or profits and opportunity costs) in connection with any use or misuse of their content, including ratings. Credit ratings are statements of opinions and are not statements of fact or recommendations to purchase hold or sell securities. They do not address the suitability of securities or the suitability of securities for investment purposes, and should not be relied on as investment advice.

Any MSCI sourced information in this document is the exclusive property of MSCI Inc. ('MSCI'). Without prior written permission of MSCI, this information and any other MSCI intellectual property may not be duplicated, reproduced, re-disseminated, redistributed or used, in whole or in part, for any purpose whatsoever, including creating any financial products and any indices. This information is provided on an "as is" basis. The user assumes the entire risk of any use made of this information. MSCI, its affiliates and any third party involved in, or related to, computing or compiling the information hereby expressly disclaim all representations, warranties or undertakings of originality, fairness, accuracy, completeness, correctness, merchantability or fitness for a particular purpose with respect to any of this material or the information contained in

this material or otherwise arising in connection therewith. Without limiting any of the foregoing, in no event shall MSCI, any of its affiliates or any third party involved in, or related to, computing or compiling the information have any liability (in negligence or otherwise, and in whole or in part) for any damages of any kind. MSCI and the MSCI indexes are services marks of MSCI and its affiliates.

The intellectual property rights and any other rights, in Russell/Nomura Japan Equity Index belong to Nomura Securities Co., Ltd. ("Nomura") and Frank Russell Company ("Russell"). Nomura and Russell do not guarantee fairness, accuracy, completeness, correctness, reliability, usefulness, marketability, merchantability or fitness of the Index, and do not account for business activities or services that any index user and/or its affiliates undertakes with the use of the Index.

Investors should consider this document as only a single factor in making their investment decision and, as such, the report should not be viewed as identifying or suggesting all risks, direct or indirect, that may be associated with any investment decision. Nomura Group produces a number of different types of research product including, among others, fundamental analysis and quantitative analysis; recommendations contained in one type of research product may differ from recommendations contained in other types of research product, whether as a result of differing time horizons, methodologies or otherwise. The Nomura Group publishes research product in a number of different ways including the posting of product on the Nomura Group portals and/or distribution directly to clients. Different groups of clients may receive different products and services from the research department depending on their individual requirements.

Figures presented herein may refer to past performance or simulations based on past performance which are not reliable indicators of future or likely performance. Where the information contains an expectation, projection or indication of future performance and business prospects, such forecasts may not be a reliable indicator of future or likely performance. Moreover, simulations are based on models and simplifying assumptions which may oversimplify and not reflect the future distribution of returns. Any figure, strategy or index created and published for illustrative purposes within this document is not intended for "use" as a "benchmark" as defined by the European Benchmark Regulation. Certain securities are subject to fluctuations in exchange rates that could have an adverse effect on the value or price of, or income derived from, the investment.

With respect to Fixed Income Research: Recommendations fall into two categories: tactical, which typically last up to three months; or strategic, which typically last from 6-12 months. However, trade recommendations may be reviewed at any time as circumstances change. 'Stop loss' levels for trades are also provided; which, if hit, closes the trade recommendation automatically. Prices and yields shown in recommendations are taken at the time of submission for publication and are based on either indicative Bloomberg, Reuters or Nomura prices and yields at that time. The prices and yields shown are not necessarily those at which the trade recommendation can be implemented.

The securities described herein may not have been registered under the US Securities Act of 1933 (the '1933 Act'), and, in such case, may not be offered or sold in the US or to US persons unless they have been registered under the 1933 Act, or except in compliance with an exemption from the registration requirements of the 1933 Act. Unless governing law permits otherwise, any transaction should be executed via a Nomura entity in your home jurisdiction.

This document has been approved for distribution in the UK as investment research by Nplc. Nplc is authorised by the Prudential Regulation Authority and regulated by the Financial Conduct Authority and the Prudential Regulation Authority. Nplc is a member of the London Stock Exchange. This document does not constitute a personal recommendation within the meaning of applicable regulations in the UK, or take into account the particular investment objectives, financial situations, or needs of individual investors. This document is intended only for investors who are 'eligible counterparties' or 'professional clients' for the purposes of applicable regulations in the UK, and may not, therefore, be redistributed to persons who are 'retail clients' for such purposes.

This document has been approved for distribution in the European Economic Area as investment research by Nomura Financial Products Europe GmbH ("NFPE"). NFPE is a company organized as a limited liability company under German law registered in the Commercial Register of the Court of Frankfurt/Main under HRB 110223. NFPE is authorized and regulated by the German Federal Financial Supervisory Authority (BaFin).

This document has been approved by NIHK, which is regulated by the Hong Kong Securities and Futures Commission, for distribution in Hong Kong by NIHK. This document is intended only for investors who are 'professional investors' for the purposes of applicable regulations in Hong Kong and may not, therefore, be redistributed to persons who are not 'professional investors' for such purposes.

This document has been approved for distribution in Australia by NAL, which is authorized and regulated in Australia by the ASIC.

This document has also been approved for distribution in Malaysia by NSM.

In Singapore, this document has been distributed by NSL, an exempt financial adviser as defined under the Financial Advisers Act (Chapter 110), among other things, and regulated by the Monetary Authority of Singapore. NSL may distribute this document produced by its foreign affiliates pursuant to an arrangement under Regulation 32C of the Financial Advisers Regulations. Where the recipient of this document is not an accredited, expert or institutional investor as defined by the Securities and Futures Act (Chapter 289), NSL accepts legal responsibility for the contents of this document in respect of such recipient only to the extent required by law. Recipients of this document in Singapore should contact NSL in respect of matters arising from, or in connection with, this document. THIS DOCUMENT IS INTENDED FOR GENERAL CIRCULATION. IT DOES NOT TAKE INTO ACCOUNT THE SPECIFIC INVESTMENT OBJECTIVES, FINANCIAL SITUATION OR PARTICULAR NEEDS OF ANY PARTICULAR PERSON. RECIPIENTS SHOULD TAKE INTO ACCOUNT THEIR SPECIFIC INVESTMENT OBJECTIVES, FINANCIAL SITUATION OR PARTICULAR NEEDS BEFORE MAKING A COMMITMENT TO PURCHASE ANY SECURITIES, INCLUDING SEEKING ADVICE FROM AN INDEPENDENT FINANCIAL ADVISER REGARDING THE SUITABILITY OF THE INVESTMENT, UNDER A SEPARATE ENGAGEMENT, AS THE RECIPIENT DEEMS FIT.

Unless prohibited by the provisions of Regulation S of the 1933 Act, this material is distributed in the US, by NSI, a US-registered broker-dealer, which accepts responsibility for its contents in accordance with the provisions of Rule 15a-6, under the US Securities Exchange Act of 1934. The entity that prepared this document permits its separately operated affiliates within the Nomura Group to make copies of such documents available to their clients.

This document has not been approved for distribution to persons other than 'Authorised Persons', 'Exempt Persons' or 'Institutions' (as defined by the Capital Markets Authority) in the Kingdom of Saudi Arabia ('Saudi Arabia') or a 'Market Counterparty' or a 'Professional Client' (as defined by the Dubai Financial Services Authority) in the United Arab Emirates ('UAE') or a 'Market Counterparty' or a 'Business Customer' (as defined by the Qatar Financial Centre Regulatory Authority) in the State of Qatar ('Qatar') by Nomura Saudi Arabia, Nplc or any other member of the Nomura Group, as the case may be. Neither this document nor any copy thereof may be taken or transmitted or distributed, directly or indirectly, by any person other than those authorised to do so into Saudi Arabia or in the UAE or in Qatar or to any person other than 'Authorised Persons', 'Exempt Persons' or 'Institutions' located in Saudi Arabia or a 'Market Counterparty' or a 'Professional Client' in the UAE or a 'Market Counterparty' or a 'Business Customer' in Qatar. Any failure to comply with these restrictions may constitute a violation of the laws of the UAE or Saudi Arabia or Qatar.

For report with reference of TAIWAN public companies or authored by Taiwan based research analyst:

THIS DOCUMENT IS SOLELY FOR REFERENCE ONLY. You should independently evaluate the investment risks and are solely responsible for your investment decisions. NO PORTION OF THE REPORT MAY BE REPRODUCED OR QUOTED BY THE PRESS OR ANY OTHER PERSON WITHOUT WRITTEN AUTHORIZATION FROM NOMURA GROUP. Pursuant to Operational Regulations Governing Securities Firms Recommending Trades in Securities to Customers and/or other applicable laws or regulations in Taiwan, you are prohibited to provide the reports to others (including but not limited to related parties, affiliated companies and any other third parties) or engage in any activities in connection with the reports which may involve conflicts of interests. INFORMATION ON SECURITIES / INSTRUMENTS NOT EXECUTABLE BY NOMURA INTERNATIONAL (HONG KONG) LTD., TAIPEI BRANCH IS FOR INFORMATIONAL PURPOSES ONLY AND IS NOT BE CONSTRUED AS A RECOMMENDATION OR A SOLICITATION TO TRADE IN SUCH SECURITIES / INSTRUMENTS.

This material may not be distributed in Indonesia or passed on within the territory of the Republic of Indonesia or to persons who are Indonesian citizens (wherever they are domiciled or located) or entities of or residents in Indonesia in a manner which constitutes a public offering under the laws of the Republic of Indonesia. The securities mentioned in this document may not be offered or sold in Indonesia or to persons who are citizens of Indonesia (wherever they are domiciled or located) or entities of or residents in Indonesia in a manner which constitutes a public offering under the laws of the Republic of Indonesia.

This document is prepared by Nomura Group or its subsidiary or affiliate (collectively, "Offshore Issuers") that is not licensed in the People's Republic of China ("PRC", excluding Hong Kong, Macau and Taiwan, for the purpose of this document) to provide securities research and this research report is not approved or intended to be circulated in the PRC. The A-share related analysis (if any) is not produced for any persons located or incorporated in the PRC. The recipients should not rely on any information contained in the research report in making investment decisions and Offshore Issuers take no responsibility in this regard.

NO PART OF THIS MATERIAL MAY BE (I) COPIED, PHOTOCOPIED, REPRODUCED OR DUPLICATED IN ANY FORM, BY ANY MEANS; OR (II) REDISSEMINATED, REPUBLISHED OR REDISTRIBUTED WITHOUT THE PRIOR WRITTEN CONSENT OF A MEMBER OF THE NOMURA GROUP. If this document has been distributed by electronic transmission, such as e-mail, then such transmission cannot be guaranteed to be secure or error-free as information could be intercepted, corrupted, lost, destroyed, arrive late or incomplete, or contain viruses. The sender therefore does not accept liability (in negligence or otherwise, and in whole or in part) for any errors or omissions in the contents of this document, which may arise as a result of electronic transmission. If verification is required, please request a hard-copy version.

The Nomura Group manages conflicts with respect to the production of research through its compliance policies and procedures (including, but not limited to, Conflicts of Interest, Chinese Wall and Confidentiality policies) as well as through the maintenance of Chinese Walls and employee training.

Additional information regarding the methodologies or models used in the production of any investment recommendations contained within this document is available upon request by contacting the Research Analysts of Nomura listed on the front page. Disclosures information is available upon request and disclosure information is available at the Nomura Disclosure web page:

<http://go.nomuranow.com/research/globalresearchportal/pages/disclosures/disclosures.aspx>

Copyright © 2020 Nomura International (Hong Kong) Ltd. All rights reserved.

Nomura Asian Equity Research Group

Hong Kong	Nomura International (Hong Kong) Limited 30/F Two International Finance Centre, 8 Finance Street, Central, Hong Kong Tel: +852 2536 1111 Fax: +852 2536 1820
Singapore	Nomura Singapore Limited 10 Marina Boulevard Marina Bay Financial Centre Tower 2, #36-01, Singapore 018983, Singapore Tel: +65 6433 6288 Fax: +65 6433 6169
Taipei	Nomura International (Hong Kong) Limited, Taipei Branch 17th Floor, Walsin Lihwa Xinyi Building, No.1, Songzhi Road, Taipei 11047, Taiwan, R.O.C. Tel: +886 2 2176 9999 Fax: +886 2 2176 9900
Seoul	Nomura Financial Investment (Korea) Co., Ltd. 17th floor, Seoul Finance Center, 136, Sejong-daero, Jung-gu, Seoul 04520, Korea Tel: +82 2 3783 2000 Fax: +82 2 3783 2500
Kuala Lumpur	Nomura Securities Malaysia Sdn. Bhd. Suite No 16.5, Level 16, Menara IMC, 8 Jalan Sultan Ismail, 50250 Kuala Lumpur, Malaysia Tel: +60 3 2027 6811 Fax: +60 3 2027 6888
India	Nomura Financial Advisory and Securities (India) Private Limited Ceejay House, Level 11, Plot F, Shivsagar Estate, Dr. Annie Besant Road, Worli, Mumbai- 400 018, India Tel: +91 22 4037 4037 Fax: +91 22 4037 4111
Indonesia	PT Nomura Sekuritas Indonesia Suite 209A, 9th Floor, Sentral Senayan II Building Jl. Asia Afrika No. 8, Gelora Bung Karno, Jakarta 10270, Indonesia Tel: +62 21 2991 3300 Fax: +62 21 2991 3333
Sydney	Nomura Australia Ltd. Level 25, Governor Phillip Tower, 1 Farrer Place, Sydney NSW 2000 Tel: +61 2 8062 8000 Fax: +61 2 8062 8362
Tokyo	Equity Research Department Financial & Economic Research Center Nomura Securities Co., Ltd. 17/F Urbannet Building, 2-2, Otemachi 2-chome Chiyoda-ku, Tokyo 100-8130, Japan Tel: +81 3 5255 1658 Fax: +81 3 5255 1747, 3272 0869

Caring for the environment: to receive only the electronic versions of our research, please contact your sales representative.

NOMURA