## **India Refining & Marketing**

Adopting a constructive view: Upgrade BPCL, IOC to Neutral, stay UW HPCL

- Adopting a constructive view on downstream SOE Cos: While we are more constructive on the downstream oil companies following the drop in crude prices and a demonstrated progressive government stance on fuel subsidies; the stocks are pricing in upside from fuel reform. We upgrade IOC and BPCL to Neutral, but retain our UW rating on HPCL.
- Stars are aligning for the downstream companies: We see two key positive factors influencing policy outcome for the downstream SOE companies 1) decline in crude prices will limit immediate price hikes, enabling government to push through reforms, and 2) government stance on fuel reforms is more encouraging, given the sharp hike in gas prices
- **Building in partial deregulation...** Using our new crude price deck (US\$80/bbl), we estimate the oil subsidy at Rs843bn in FY11 (vs Rs480bn in FY10), however we build in price hikes in auto fuels, limiting subsidies to Rs678bn. We assume upstream companies will absorb auto fuel losses and govt will largely backstop cooking fuel subsidies. We assume downstream cos will absorb Rs60bn subsidy loss (in line with FY10).
- ...despite pitfalls: Inflation continues to be a concern with food inflation at 16.5%. Our assumed hike in fuel prices will have a 19bps direct impact on WPI inflation and will likely face political pushback.
- ...but stocks are pricing in some of the upside: Downstream stocks have rallied 8-11% over the last 2 weeks and are trading at 5.2-6.3x EV/EBITDA. Upside could be limited, given uncertain policy outcome.
- **IOC and BPCL raised to Neutral; UW on HPCL:** We favor IOC and BPCL for their more diversified and balanced earnings streams. We maintain an UW on HPCL which we think is more vulnerable to policy disappointment.
- **PT of Rs380/600/315 for IOC, BPCL and HPCL**: Our new PTs are based on 6x EV/EBITA, a discount to regional peers given the uncertain policy environment for the Indian downstream companies. Key risk on the upside emanates from a more progressive government policy particularly in respect to the sensitive cooking fuels. Downside risk to our Neutral recommendation would come from a sharp rally in crude oil prices and a tardy implementation of reform measures

### **Equity Ratings and Price Targets**

		Mkt Cap		Rating		Price Target		
Company	Symbol	(Rs mn)	Price(Rs)	Cur	Prev	Cur	Prev	
Bharat Petroleum corporation I	BPCL.BO	202,026	558.80	Ν	UW	600.00	430.00	
Hindustan Petroleum Corporatio	HPCL.BO	117,571	347.20	UW	n/c	315.00	290.00	
Indian Oil Corporation Limited	IOC.BO	801,710	330.20	Ν	UW	380.00	272.50	
Courses Company data Disemberry ID	Manage actionates a/a	no okonao	All prices as of 01 May 10					

Source: Company data, Bloomberg, J.P. Morgan estimates. n/c = no change. All prices as of 21 May 10.

See page 17 for analyst certification and important disclosures, including non-US analyst disclosures.

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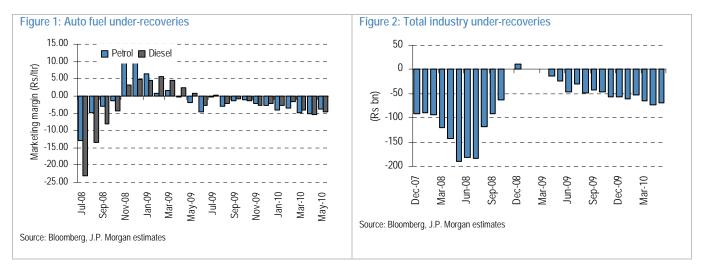
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## Marketing - Reforms loom, but the road remains bumpy

While the broader markets have seen worries over Europe result in underwhelming performance, the OMCs have outperformed, with hopes of at least a partial implementation of much needed fuel price reforms, as suggested by the Kirit Parikh committee. With the government also approving a doubling in prices of APM (Administered Price Mechanism) gas sold by ONGC/OIL, these hopes for reform have received a fillip.



Crude, having averaged \$70/bbl in CY10 (J.P. Morgan 2011 forecast - \$80/bbl), under-recoveries are expected to be elevated – we estimate Rs843bn in the absence of reforms. Given the government's stated intention to cut the fiscal deficit to 5.5% in FY11, we expect to see partial fuel price reforms. We expect auto fuels to be the key focus, with petrol pricing being de-regulated, per the Parikh committee, and partial de-regulation of diesel (we build a Rs 2/lt hike). With the political calendar over the next few months light for the ruling UPA alliance, we do see a window of opportunity for the government to push through unpopular, but much needed reforms.

#### Table 1: Subsidy assumptions

	FY09	FY10	FY11E	FY12E	FV1	1 Sensitivity	1
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Crude (US\$/bbl)	86.5	70.0	80.0	80.0	75.0	85.0	90.0
Auto fuels* (Rs bn)	574	149	255	277	124	386	517
Cooking fuels (Rs bn)	461	334	423	431	381	465	506
Total subsidy (Rs bn)	1,035	484	678	708	505	851	1,024
Govt. support (Rs bn)	713	260	363	371	321	405	446
Upstream support (Rs bn)	320	149	255	277	124	386	517
OMC share (Rs bn)	2	74	60	60	60	60	60
% share	0.2%	15.4%	8.8%	8.5%	11.9%	7.1%	5.9%

Source: J.P. Morgan estimates. \* - we assume a Rs5/lt hike in petrol and a Rs2/lt hike in diesel prices in FY11/12.

We take a constructive view on the subsidy issue from the downstream perspective we assume the upstream will bear auto fuel subsidies, with the government bearing

While the overall subsidy bill rises with our new crude assumption, we factor Rs60bn subsidy sharing for the OMCs with upstream supporting auto fuels and govt. largely backstopping cooking fuel subsidies.

the bulk of cooking fuel subsidies. We build in a cumulative ~Rs60bn share for the three OMC's in each of FY11/12.

Table 2: Earnings impact with ZERO payout

	FY11E		FY12E	
	EBITDA	Net Profit	EBITDA	Net Profit
BPCL	53,497	23,096	61,455	27,685
% change	34.3%	67.4%	28.7%	54.5%
HPCL	48,240	21,400	51,707	21,203
% change	38.1%	74.1%	34.7%	80.7%
IOC	179,653	108,925	186,798	114,916
% change	23.1%	29.4%	21.8%	28.5%

Source: J.P. Morgan estimates.

While the Rs60bn payout is <10% of the total subsidy burden, as can be seen from the table above, it is a large drag on profitability. In the event of the government backstopping the entire cooking fuel burden, we see significant upside to OMC earnings - HPCL in particular is particularly leveraged to government actions.

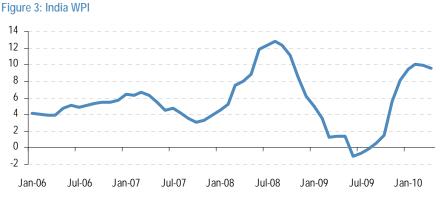
We build full de-regulation on petrol (equates to a RS5/lt rise) and partial deregulation on diesel (Rs2/lt – a third of the extent for full de-regulation) into our assumptions. We think the substantial hike in the price of APM gas to market levels indicates willingness on the government's part to carry out unpopular reforms. Current weakness in crude, coupled with a light political calendar make this a big window of opportunity to carry out fuel pricing reforms, in our view. The litmus test for the government's commitment to reforms will however be its willingness to raise prices even at elevated crude price levels.

#### Table 3: Price hikes required for de-regulation

	Current	De-regulated	% change	JPMe	% change
Petrol (Rs/It)	51.8	56.8	9.7%	56.8	9.7%
Diesel (Rs/lt)	39.6	45.6	15.1%	41.6	5.1%

Source: Bloomberg, J.P. Morgan estimates

However, as was seen with the debate on the additional excise/customs duties levied on auto fuels in the Union Budget, pricing reform would face significant political pushback, in our view. In addition, inflationary concerns are likely to add to political resistance to price hikes – we estimate a 10% hike in petrol/diesel leads to a 9/20 bps impact on inflation, in addition to indirect knock-on effects.



Source: Bloomberg.

Our earnings would be 29-74% higher if downstream companies were to make no payment towards fuel subsidies

Light political calendar, softening crude – provide a 'window' for pushing through reforms.

We assume full de-regulation on petrol, and partial de-regulation for diesel.

## **Refining – Recovering from 2009**

In addition to large under-recoveries on the marketing side, all 3 OMCs suffered from a weak refining environment – regional benchmark GRMs hit 6-year lows (\$1.13/bbl) in the December quarter. However, there has since been a pick-up in refining, with regional GRMs currently averaging \$3.75/bbl.

Figure 4: Singapore GRMs



Source: Bloomberg.

While this recovery remains tenuous in the face of continuing economic uncertainty, we expect margins, especially in Asia to remain comparatively resilient. European refiners are already running at 2mn bbls below CY08 run-rates – with 1/3rd of Europe's refiners at sub-optimal capacities of less than 100kbopd, lower growth prospects and weak demand could accelerate the trend of refining capacity shutdowns in the OECD, holding up margins in Asia.

#### Table 4: Global refinery shutdowns

Company	kBOPD	Place
Valero	275	Aruba
Valero	190	Delaware
Sunoco	145	Eagle Point
Holly	35	Tulsa
Total	80	Normandy
Nippon	60	Toyama
Nippon	225	Several
Nippon	115	Several
PetroPlus	117	Teesside
Total	137	Dunkirk
Caltex	105	Kurnell
Shell	130	Montreal
Chevron	220	Pembroke
OMV	70	Arpechim
Showa Shell	120	Keihin
Cosmo	80	Several
Idemitsu	100	Several
Total	2204	

Source: Companies, news reports

Refining has come off Dec-09 lows – diesel spreads are particularly strong, supporting Asian refiners as their slates are skewed towards diesel.

Over 2mn bbls of capacity shut globally. Further pressure is likely to impact Europe, with a large number of small refiners under threat.

# Valuations – diversification wins, upgrade BP/IOC to Neutral

We value the OMCs on an EV/EBITDA basis – using a multiple of 6x FY12 EV/EBITDA - this is largely in-line with historical multiples, and is at a 10% discount to regional peers, warranted in our view by the uncertainty on government policy.

All three OMCs have in recent years attempted to diversify their business beyond refining and marketing, in an attempt to reduce the overhang of government decisions on subsidies, and to create revenue streams that are more stable.

#### Table 5: Valuations

	BPCL	HPCL	IOC
EV/EBITDA	6.00	6.00	6.00
EBITDA (Rs mn)	47,736	38,387	153,332
EV (Rs mn)	286,414	230,322	919,991
Net debt (Debt-Cash- Investments)	69,851	123,240	(5,009)
Equity (Rs mn)	216,562	107,081	925,000
Fair Value/PT – Mar11	599	314	381

Source: J.P. Morgan estimates.

IOC, which derives ~25% of EBITDA from its pipeline and petchem/lubes business, has a more stable income stream, which should benefit in an environment with more conducive government policy. We upgrade our rating for IOC to a Neutral.

BPCL, while having a smaller contribution from non-refining/non-marketing businesses, has been the early mover in the E&P space. BPCL has financial interests in a number of blocks (largely international), the most well-known being the Wahoo block, off the coast of Brazil. Data on potential reserves should start flowing through in the coming months, providing visibility on a new, albeit future revenue stream. We are upgrading our rating for BPCL to Neutral

HPCL is the most vulnerable to policy risk, in our view, particularly in the event of the government failing to deliver on reform hopes. We maintain our UW rating.





Source: Bloomberg.

As can be seen from the chart above, HPCL has lagged BP/IOC in performance over the last 18 months, driven in our view by a period of elevated uncertainty on government policy, coupled with crude prices rising off their early '09 lows.

We use 6x EV/EBITDA - at ~10% discount to regional peers to factor uncertain policy.

We expect HPCL's underperformance to continue, due to its higher leverage to govt. policy moves.

For all three names, the key risk on the upside emanates from a more progressive government policy – particularly in respect to the sensitive cooking fuels. Downside risk to our Neutral rating on BPCL and IOC would come from a sharp rally in crude oil prices and a tardy implementation of reform measures.

## Table 6: Earnings change

	BPCL	HPCL	IOC
FY11			
EBITDA (Rs mn)	39.837	34,944	145,972
% change	-9.1%	-4.8%	-59.3%
Net Profit (Rs mn)	13,794	12,294	84,186
% change	-17.4%	-11.3%	-65.8%
GRM (\$/bbl)	4.93	4.28	5.50
% change	-0.6%	0.0%	22.2%
Subsidy (Rs mn)	13,661	13,296	33,681
% change	19.0%	18.7%	18.0%
FY12			
EBITDA (Rs mn)	47,736	38,387	153,332
% change	3.1%	-14.7%	-58.3%
Net Profit (Rs mn)	17,918	11,733	89,412
% change	6.2%	-24.7%	-65.6%
GRM (\$/bbl)	5.67	4.53	5.50
% change	0.2%	-14.5%	15.8%
Subsidy (Rs mn)	13,720	13,320	33,466
% change	-15.0%	-13.7%	-12.2%

Source: J.P. Morgan estimates.

## Bharat Petroleum corporation limited (Reuters: BPCL.BO, Bloomberg: BPCL IN)

Rs in mn, year-end Mar	FY08A	FY09A	FY10E	FY11E	FY12E		
Revenue	1,102,082	1,340,744	1,266,258	1,384,762	1,409,937	Shares O/S (mn)	362
Net Profit (Rs bn)	14.2	7.4	11.3	13.8	17.9	Market Cap (Rs mn)	202,026
EPS (Rs)	39.40	20.35	31.34	38.15	49.56	Market Cap (\$ mn)	4,305
DPS (Rs)	4.00	7.00	9.40	11.45	14.87	Price (Rs)	558.80
Revenue Growth (%)	14.1%	21.7%	-5.6%	9.4%	1.8%	Date Of Price	21 May 10
EPS growth (%)	-21.1%	-48.3%	54.0%	21.7%	29.9%	Free float (%)	
ROCE	7.8%	5.5%	4.7%	8.1%	10.2%	3-mth trading value (Rs mn)	44.4
ROE	13.0%	6.2%	9.1%	10.3%	12.4%	3-mth trading value (\$ mn)	0.9
P/E	14.2	27.5	17.8	14.6	11.3	3-mth trading volume (mn)	0.1
P/BV	1.7	1.7	1.6	1.5	1.3	BSE30	16,446
EV/EBITDA	8.1	8.3	11.5	7.7	6.2	Exchange Rate	46.92
Dividend Yield	0.7%	1.3%	1.7%	2.0%	2.7%	Fiscal Year End	Mar

Source: Company data, Bloomberg, J.P. Morgan estimates.

## Hindustan Petroleum Corporation Limited (Reuters: HPCL.BO, Bloomberg: HPCL IN)

Rs in mn, year-end Mar	FY08A	FY09A	FY10E	FY11E	FY12E		
Revenue	1,099,664	1,292,428	1,226,235	1,410,781	1,417,804	Shares O/S (mn)	339
Net Profit (Rs bn)	13.6	7.6	8.4	12.3	11.7	Market Cap (Rs mn)	117,571
EPS (Rs)	40.05	22.24	24.79	36.10	34.45	Market Cap (\$ mn)	2,506
DPS (Rs)	3.00	5.25	7.44	10.83	10.33	Price (Rs)	347.20
Revenue Growth (%)	17.1%	17.5%	-5.1%	15.0%	0.5%	Date Of Price	21 May 10
EPS growth (%)	-18.5%	-44.5%	11.5%	45.6%	-4.6%	Free float (%)	
ROCE	4.1%	7.0%	4.7%	7.5%	7.7%	3-mth trading value (Rs mn)	68.2
ROE	13.4%	6.9%	7.4%	10.2%	9.1%	3-mth trading value (\$ mn)	1.5
P/E	8.7	15.6	14.0	9.6	10.1	3-mth trading volume (mn)	0.1
P/BV	1.1	1.1	1.0	0.9	0.9	BSE30	16,446
EV/EBITDA	11.6	6.7	10.1	7.3	6.2	Exchange Rate	46.92
Dividend Yield	0.9%	1.5%	2.1%	3.1%	3.0%	Fiscal Year End	Mar

Source: Company data, Bloomberg, J.P. Morgan estimates.

## Indian Oil Corporation Limited (Reuters: IOC.BO, Bloomberg: IOCL IN)

Rs in mn, year-end Mar	FY08A	FY09A	FY10E	FY11E	FY12E		
Revenue	2,449,691	3,055,271	2,766,621	3,130,453	3,188,531	Shares O/S (mn)	2,428
Net Profit (Rs bn)	69.6	29.5	96.3	84.2	89.4	Market Cap (Rs mn)	801,710
EPS (Rs)	58.39	24.74	80.76	70.60	74.99	Market Cap (\$ mn)	17,085
DPS (Rs)	11.00	7.42	24.23	21.18	22.50	Price (Rs)	330.20
Revenue Growth (%)	14.0%	24.7%	-9.4%	13.2%	1.9%	Date Of Price	21 May 10
EPS growth (%)	-7.2%	-57.6%	226.5%	-12.6%	6.2%	Free float (%)	
ROCE	10.7%	5.7%	13.9%	12.1%	13.1%	3-mth trading value (Rs mn)	34.2
ROE	18.4%	6.9%	20.6%	16.1%	15.4%	3-mth trading value (\$ mn)	0.7
P/E	5.7	13.3	4.1	4.7	4.4	3-mth trading volume (mn)	0.0
P/BV	1.9	1.8	1.6	1.5	1.3	BSE30	16,446
EV/EBITDA	5.2	6.7	3.8	4.0	3.3	Exchange Rate	46.92
Dividend Yield	3.3%	2.2%	7.3%	6.4%	6.8%	Fiscal Year End	Mar

Source: Company data, Bloomberg, J.P. Morgan estimates.

## **Company Description**

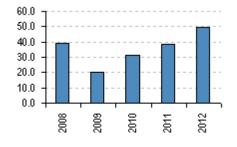
BPCL owns refineries at Kochi and Mumbai with a total refining capacity of 19.5mmtpa. It also has a majority stake (62%) in the 3mmtpa Numaligarh Refinery. On the oil marketing front, BPCL markets ~24mmtpa of petroleum products with 29% and 25% market share in petrol and diesel retailing, respectively, which highlights its strong retail franchise.

FY11 Sensitivity	EBITDA	EPS
	impact (%)	impact (%)
Crude Price		
Every US\$5/bbl increase in crude price	-0.7%	-2.2%
Subsidy sharing		
10% increase in subsidy sharing proportion	-3.4%	-6.7%
GRMs		
Impact with every US\$0.5/bbl change in GRMs	-9.9%	-19.4%

#### Price target and valuation analysis

Our Mar-11 PT is Rs600/share based on 6.0x EV/EBITDA. Our PT implies 12.1x FY12E EPS. Our earnings are based on benign subsidy sharing environment (<10% share for downstream). Lack of clarity on subsidy sharing and uncertainty on retail pricing freedom constrain earnings and valuations.





Source: Company, J.P.Morgan estimates

EPS:	J.P.	Morgan	vs	consensus	
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46.9

52.6

J. P. Morgan Consensus FY11E 38.2 FY12E 49.6

Source: Bloomberg, J.P.Morgan estimates

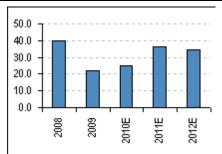
FY11E EPS	38.2
FY12E EPS	49.6
Current Stock Price	559
FY11E P/E	14.7
FY12E P/E	11.3

Our PT of Rs600/share is based on 6x EV/EBITDA lower than regional peers given uncertainty on earnings due to uncertainty in subsidy sharing mechanism and pricing reforms. Key risk emanates from policy initiatives like clarity on subsidy loss-sharing mechanism and reforms on fuel pricing.

## **Company Description**

HPCL is one of the three major downstream oil companies in India with exposure to oil marketing and refining. HPCL has two refineries at Vishakapatnam and Mumbai with a total refining capacity of 16.2 mmt. On the oil marketing front, HPCL markets ~22 mmt of petroleum products with 24% and 22% market share in petrol and diesel retailing. HPCL has ~1,500 kms of crude and product pipelines. It also has a minority stake (16.9%) in MRPL which owns a 12.5 mmt refinery.





Source: Company, J.P.Morgan estimates

#### EPS: J.P. Morgan vs consensus

	J. P. Morgan	Consensus
FY11E	36.1	37.7
FY12E	34.4	41.7

Source: Bloomberg, J.P.Morgan estimates

FY11 Sensitivity	EBITDA	EPS
	impact (%)	impact (%)
Crude Price		
Every US\$5/bbl increase in crude price	0.8%	0.7%
Subsidy sharing		
10% increase in subsidy sharing proportion	-3.8%	-7.4%
GRMs		
Impact with every US\$0.5/bbl change in GRMs	-8%	-16%
Source: J.P.Morgan estimates		

## Price target and valuation analysis

Our Mar-11 PT is Rs315/share based on 6.0x EV/EBITDA. Our PT implies 9.1x FY11E EPS. Our earnings are based on benign subsidy sharing environment (<10% share for downstream). Lack of clarity on subsidy sharing and uncertainty on fuel pricing freedom constrain earnings. HPCL has the highest exposure to marketing amongst the three R&M companies and we think it will be more affected by sector reform or lack thereof.

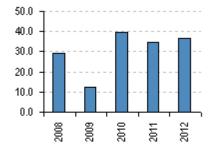
FY11E EPS FY12E EPS	36.1 34.4
Current Stock Price	346
FY11E P/E	9.6
FY12E P/E	10.0

Our PT of Rs315/share is based on 6x EV/EBITDA lower than regional peers given uncertainty on earnings due to uncertainty in subsidy sharing mechanism. Key risk emanates from policy initiatives like clarity on subsidy loss sharing mechanism and reforms on fuel pricing.

## **Company Description**

IOC is the largest downstream R&M company in India. The company has seven refineries with a total refining capacity of 47.3 mmt; it also has a 52% stake in 10.5mmtpa Chennai Petroleum and 74% stake in 2.4mmtpa Bongaigaon Refinery. IOC markets ~61 mmt of petroleum products with c.42% and c.46% market share, in petrol and diesel retailing, respectively. It has the most extensive network of crude and product pipelines. IOC recently foraved into petrochemicals and has a 0.5mmt PX/PTA plant at its Panipat Refinery.

#### **IOC : EPS/share**



Source: Company, J.P.Morgan estimates

#### EPS: J.P. Morgan vs consensus

	J. P. Morgan Consens			
FY11E	34.7	32.4		
FY12E	36.8	34.3		

Source: Bloomberg, J.P.Morgan estimates

	EBITDA	EPS
	impact (%)	impact (%)
Crude Price		
Every US\$5/bbl increase in crude price	0.2%	-0.1%
Subsidy sharing		
10% increase in subsidy sharing proportion	-2.3%	-2.9%
GRMs		
Impact with every US\$0.5/bbl change in GRMs	-6.0%	-7.6%
Source: J.P.Morgan estimates		

#### Price target and valuation analysis

Our Mar-11 PT is Rs380/share based on 6.0x EV/EBITDA. Our PT implies 10.3x FY12E EPS. Our earnings are based on benign subsidy sharing environment (<10% share for downstream). Lack of clarity on subsidy sharing and uncertainty on retail pricing freedom constrain earnings and valuations.

FY11E EPS	34.7
FY12E EPS	36.8
Current Stock Price	325
FY11E P/E	9.4
FY12E P/E	8.8

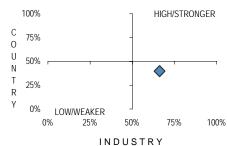
Our PT of Rs380/share is based on 6x EV/EBITDA lower than regional peers given uncertainty on earnings due to uncertainty in subsidy sharing mechanism and pricing reforms. Key risk emanates from policy initiatives like clarity on subsidy loss sharing mechanism and reforms on fuel pricing.

#### All Data As Of 24-May-10

## Q-Snapshot: Bharat Petroleum Corp. Ltd.

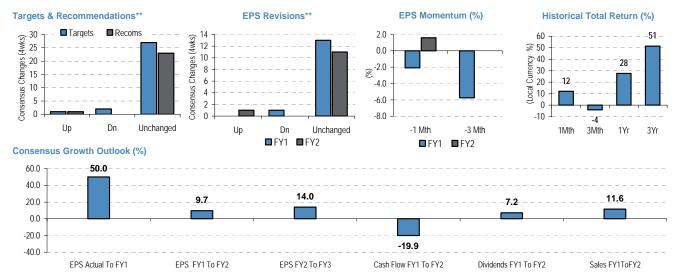
Score 0% (worst) to 100% (best)	vs Country	vs Industry	Raw Value
Value			
P/E Vs Market (12mth fwd EPS)	61%	75%	0.8x
P/E Vs Sector (12mth fwd EPS)	38%	57%	1.0x
EPS Growth (forecast)	69%	68%	29.8%
Value Score	59%	74%	
Price Momentum			
12 Month Price Momentum	35%	65%	27.6%
1 Month Price Reversion	2%	2%	12.1%
Momentum Score	6%	30%	
Quality			
Return On Equity (forecast)	15%	31%	9.4%
Earnings Risk (Variation in Consensus)	11%	26%	0.30
Quality Score	11%	26%	
Earnings & Sentiment			
Earnings Momentum 3mth (risk adjusted)	47%	41%	-9.5
1 Mth Change in Avg Recom.	79%	83%	0.13
Net Revisions FY2 EPS	90%	84%	100%
Earnings & Sentiment Score	81%	83%	
COMPOSITE Q-SCORE* (0% To 100%)	40%	66%	





Quant Return Drivers Summary (vs Country)





Closest in Country by Size (Consensus. ADV = average daily value traded in US\$m over the last 3 mths)

Code	Name	Industry	USD MCAP	ADV	PE FY1	Q-Score*
500300-IN	Grasim Industries Ltd.	Construction Materials	4,804	8.67	9.1	26%
500550-IN	Siemens India Ltd.	Electrical Products	4,762	6.93	28.8	23%
500124-IN	Dr. Reddy's Laboratories Ltd.	Pharmaceuticals: Generic	4,727	11.29	20.1	56%
532754-IN	GMR Infrastructure Ltd.	Electric Utilities	4,493	5.50	115.4	1%
500228-IN	JSW Steel Ltd.	Steel	4,337	42.70	10.4	80%
500547-IN	Bharat Petroleum Corp. Ltd.	Oil Refining/Marketing	4,321	7.90	12.0	40%
532659-IN	Infrastructure Development Finance Co. Ltd.	Finance/Rental/Leasing	4,206	15.30	16.0	64%
500820-IN	Asian Paints (India) Ltd.	Industrial Specialties	4,143	1.91	25.9	68%
533148-IN	JSW Energy Ltd.	Electric Utilities	3,995	6.54	13.5	
500002-IN	ABB Ltd. (India)	Electrical Products	3,745	6.62	36.5	14%
500359-IN	Ranbaxy Laboratories Ltd.	Pharmaceuticals: Other	3,740	15.41	24.2	34%

Source: Factset, Thomson and J.P. Morgan Quantitative Research. For an explanation of the Q-Snapshot, please visit http://jpmorgan.hk.acrobat.com/qsnapshot/ Q-Snapshots are a product of J.P. Morgan's Global Quantitative Analysis team and provide quantitative metrics summarized in an overall company 'Q-Score.' Q-Snapshots are based on consensus data and should not be considered as having a direct relationship with the J.P. Morgan analysts' recommendation. \* The Composite Q-Score is calculated by weighting and combining the 10 Quant return drivers shown. The higher the Q-Score the higher the one month

expected return. On a 14 Year back-test the stocks with the highest Q-Scores have been shown (on average) to significantly outperform those stocks with the lowest Q-Scores in this universe. \*\* The number of up, down and unchanged target prices, recommendations or EPS forecasts that make up consensus.

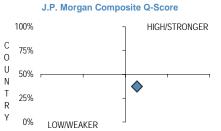
#### All Data As Of 24-May-10

## Q-Snapshot: Indian Oil Corp. Ltd.

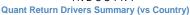
Jindal Steel & Power Ltd.

GAIL (India) Ltd.

Score 0% (worst) to 100% (best)	vs Country	vs Industry	Raw Value
Value			
P/E Vs Market (12mth fwd EPS)	62%	76%	0.8x
P/E Vs Sector (12mth fwd EPS)	55%	76%	0.8x
EPS Growth (forecast)	56%	56%	23.8%
Value Score	59%	77%	
Price Momentum			
12 Month Price Momentum	34%	64%	26.5%
1 Month Price Reversion	1%	1%	17.4%
Momentum Score	3%	20%	
Quality			
Return On Equity (forecast)	24%	39%	11.7%
Earnings Risk (Variation in Consensus)	20%	44%	0.22
Quality Score	18%	38%	
Earnings & Sentiment			
Earnings Momentum 3mth (risk adjusted)	65%	57%	15.4
1 Mth Change in Avg Recom.	19%	13%	-0.15
Net Revisions FY2 EPS	90%	84%	100%
Earnings & Sentiment Score	71%	62%	
COMPOSITE Q-SCORE* (0% To 100%)	37%	57%	



0% 25% 50% 75% 100%





12,598

12,262

33.17

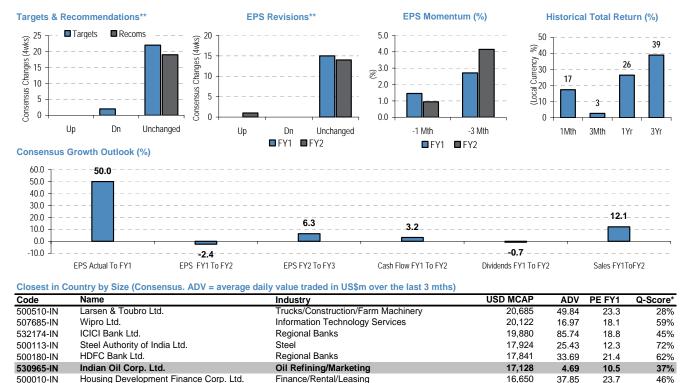
15.53

12.6

16.2

86%

72%



500900-IN
Sterlite Industries (India) Ltd.
Miscellaneous Manufacturing
11,520
36.11
9.2
69%

532792-IN
Cairn India Ltd.
Oil & Gas Production
11,283
16.73
47.8
56%

Source: Factset, Thomson and J.P. Morgan Quantitative Research. For an explanation of the Q-Snapshot, please visit http://jpmorgan.hk.acrobat.com/qsnapshot/
Q-Snapshots are a product of J.P. Morgan's Global Quantitative Analysis team and provide quantitative metrics summarized in an overall company 'Q-Score.'
Q-Snapshots are based on consensus data and should not be considered as having a direct relationship with the J.P. Morgan analysts' recommendation.
Vertical Acrossical Acr

Steel

Gas Distributors

\* The Composite Q-Score is calculated by weighting and combining the 10 Quant return drivers shown. The higher the Q-Score the higher the one month expected return. On a 14 Year back-test the stocks with the highest Q-Scores have been shown (on average) to significantly outperform those stocks with the lowest Q-Scores in this universe. \*\* The number of up, down and unchanged target prices, recommendations or EPS forecasts that make up consensus.

532286-IN

532155-IN

100%

22

3Yr

Sales FY1ToFY2

#### All Data As Of 24-May-10

## Q-Snapshot: Hindustan Petroleum Corp. Ltd.



EPS Actual To FY1 EPS FY1 To FY2

-40.0

-60.0

EPS FY2 To FY3 Cash Flow FY1 To FY2

-40.6

Dividends FY1 To FY2

Closest in Country by Size (Consensus. ADV = average daily value traded in US\$m over the last 3 mths)

Code	Name	Name Industry		ADV	PE FY1	Q-Score*
532778-IN	Lanco Infratech Ltd. Engineering & Construction		2,818	9.53	25.3	62%
505537-IN	Zee Entertainment Enterprises Ltd.	Movies/Entertainment	2,655	6.92	22.5	60%
511218-IN	Shriram Transport Finance Co. Ltd.	Finance/Rental/Leasing	2,606	3.75	10.9	93%
532321-IN	Cadila Healthcare Ltd.	Pharmaceuticals: Other	2,603	1.16	19.6	82%
532538-IN	Ultratech Cement Ltd.	Construction Materials	2,517	3.95	12.9	14%
500104-IN	Hindustan Petroleum Corp. Ltd.	Oil Refining/Marketing	2,512	6.71	9.5	5%
500480-IN	Cummins India Ltd.	Trucks/Construction/Farm Machinery	2,406	2.01	24.2	61%
500302-IN	Piramal Healthcare Ltd	Pharmaceuticals: Other	2,243	12.25	18.8	55%
500114-IN	Titan Industries Ltd.	Other Consumer Specialties	2,118	3.92	31.0	82%
532424-IN	Godrej Consumer Products Ltd.	Household/Personal Care	2,111	1.34	24.3	68%
500830-IN	Colgate-Palmolive (India) Ltd.	Household/Personal Care	2,045	1.38	24.3	71%

Source: Factset, Thomson and J.P. Morgan Quantitative Research. For an explanation of the Q-Snapshot, please visit http://jpmorgan.hk.acrobat.com/qsnapshot/ Q-Snapshots are a product of J.P. Morgan's Global Quantitative Analysis team and provide quantitative metrics summarized in an overall company 'Q-Score.' Q-Snapshots are based on consensus data and should not be considered as having a direct relationship with the J.P. Morgan analysts' recommendation. \* The Composite Q-Score is calculated by weighting and combining the 10 Quant return drivers shown. The higher the Q-Score the higher the one month

expected return. On a 14 Year back-test the stocks with the highest Q-Scores have been shown (on average) to significantly outperform those stocks with the lowest Q-Scores in this universe. \*\* The number of up, down and unchanged target prices, recommendations or EPS forecasts that make up consensus.

## Table 7: BPCL: Summary financials

Profit and Loss statement						Cash flow statement					
Rs in millions, year-end Mar	FY08	FY09	FY10E	FY11E	FY12E		FY08	FY09	FY10E	FY11E	FY12E
Revenues	1,102,082	1,340,744	1,266,258	1,384,762	1,409,937	EBIT	18,744	16,617	16,244	27,493	33,007
% change Y/Y	14%	22%	-6%	9%	2%	Depreciation & amortisation	10,982	10,756	10,624	12,344	14,729
						Change in working capital	(26,723)	21,498	(33,552)	(837)	3,760
EBITDA	29,726	27,373	26,868	39,837	47,736	Taxes	(9,059)	(4,900)	(5,623)	(6,845)	(8,891)
% change Y/Y	-13%	-8%	-2%	48%	20%	Others	-	-	-	-	-
EBITDA Margin (%)	2.7%	2.0%	2.1%	2.9%	3.4%	Cash flow from operations	(6,056)	43,971	(12,308)	32,155	42,604
EBIT	18,744	16,617	16,244	27,493	33,007	Capex	(20,002)	(23,434)	(66,079)	(18,197)	(17,400)
% change Y/Y	-25%	-11%	-2%	69%	20%	Change in investments	(20232)	(77593)	64017	39999	(1)
EBIT Margin (%)	1.7%	1.2%	1.3%	2.0%	2.3%	Interest (other income)	5,669	(6,576)	796	(6,750)	(6,063)
Net financial income	5,669	(6,576)	796	(6,750)	(6,063)	Free cash flow	(40,621)	(63,632)	(13,573)	47,207	19,140
Earnings before tax	24,413	10,041	17,041	20,743	26,944						
% change Y/Y	-12%	-59%	70%	22%	30%	Equity raised/ (repaid)	-	-	-	-	-
Тах	10,167	2,682	5,709	6,949	9,026	Debt raised/ (repaid)	41,931	61,490	17,557	(42,381)	(12,930)
as % of EBT	-42%	-27%	-34%	-34%	-34%		( )	( )	( ·)	<i>(</i> )	( )
Net Income (adjusted)	14,246	7,359	11,332	13,794	17,918	Dividends paid	(1,605)	(2,809)	(3,774)	(4,593)	(5,967)
% change Y/Y	-21%	-48%	54%	22%	30%	Beginning cash	8,640	9,616	4,416	4,636	4,868
Shares Outstanding	362	362	362	362	362	Ending cash	9,616	4,416	4,636	4,868	5,111
EPS (adjusted)	39.4	20.4	31.3	38.2	49.6						
% change Y/Y	-21%	-48%	54%	22%	30%						
Balance sheet						Ratio Analysis					
	FY08	FY09	FY10E	FY11E	FY12E	%, year-end Mar	FY08	FY09	FY10E	FY11E	FY12E
Cash and cash equivalents	9,616	4,416	4,636	4,868	5,111	EBITDA margin	2.7%	2.0%	2.1%	2.9%	3.4%
Accounts receivable	16,086	14,257	19,025	20,791	21,160	EBIT margin	1.7%	1.2%	1.3%	2.0%	2.3%
Inventories	106,038	68,239	114,151	124,749	126,958	Net profit margin	1.3%	0.5%	0.9%	1.0%	1.3%
Others	65,332	65,973	50,945	50,945	50,945						
Current assets	187,457	148,469	184,121	196,485	199,063						
						Sales growth	14.1%	21.7%	-5.6%	9.4%	1.8%
Total Investments	103,181	180,774	116,756	76,757	76,758	Net profit growth	-21.1%	-48.3%	54.0%	21.7%	29.9%
Net fixed assets	127,354	140,033	195,488	201,341	204,012						
Liabilities	135,941	111,189	118,227	127,072	131,009						
Provisions	9,861	17,124	12,187	14,869	17,269						
Total current liabilities	145,803	128,313	130,413	141,941	148,279	Interest coverage (x)	2.8	0.8	1.3	1.8	2.3
Total assets	281,805	345,378	370,588	337,511	336,667	Net debt to total capital	13%	8%	29%	31%	27%
						Net debt to equity	32%	22%	84%	76%	61%
Total debt	150,224	211,714	229,271	186,890	173,960	Sales/assets	391%	388%	342%	410%	419%
Other liabilities	14,814	12,392	12,478	12,581	12,716	Assets/equity	241%	285%	288%	245%	224%
Total liabilities	165,037	224,107	241,749	199,471	186,676	ROE	13.0%	6.2%	9.1%	10.3%	12.4%
Shareholders' equity	116,768	121,281	128,840	138,040	149,991	ROCE	13.7%	10.6%	8.4%	10.6%	12.8%
BVPS	323.0	335.5	356.4	381.8	414.9						

Source: J.P. Morgan estimates Company data.

## Table 8: HPCL: Summary financials

Profit and Loss statement						Cash flow statement					
Rs in millions, year-end Mar	FY08	FY09	FY10E	FY11E	FY12E		FY08	FY09	FY10E	FY11E	FY12E
Revenues	1,099,664	1,292,428	1,226,235	1,410,781	1,417,804	EBIT	9,985	21,994	16,373	25,025	23,853
% change Y/Y	17%	18%	-5%	15%	0%	Depreciation & amortisation	9,304	10,661	9,584	9,919	14,534 9,945
EBITDA	10 200	22455	25.054	24.044	38,387	Change in working capital	(51,097) 1,123	28,946 (3,280)	(23,072) (3,780)	25,045 (5,505)	9,945 (5,254)
% change Y/Y	19,289 -28%	32,655 69%	25,956 -21%	34,944 35%	30,307	Taxes Others	1,123	(3,260) 44	(3,760)	(3,505)	(3,234)
EBITDA Margin (%)	-28%	3%	-21%	2%	3%	Cash flow from operations	(30,676)	58,365	(895)	54,484	43,079
EBIT DA Wargin (76)	9,985	21,994	16,373	25,025	23,853	Capex	(30,296)	(36,813)	(35,820)	(38,585)	(15,500)
% change Y/Y	-48%	120%	-26%	23,023	-5%	Change in investments	2437	(69582)	48274	25000	15000
EBIT Margin (%)	1%	2%	1%	2%	2%	Interest (other income)	4,468	(11,876)	(3,774)	(6,676)	(6,341)
Net financial income	4.468	(11.876)	(3.774)	(6.676)	(6,341)	Free cash flow	(54,067)	(59,906)	7.785	34,223	36,238
Earnings before tax	14,453	10,118	12,599	18,349	17,512	The cash low	(34,007)	(37,700)	1,105	54,225	30,230
% change Y/Y	-33%	-30%	25%	46%	-5%	Equity raised/ (repaid)	647	(10,968)			
Tax	812	2,545	4,158	6.055	5,779	Debt raised/ (repaid)	62.681	67,613	(15,191)	(29,387)	(31,611)
as % of EBT	-6%	-25%	-33%	-33%	-33%		02,001	07,010	(10,171)	(27,007)	(01/011)
Net Income (adjusted)	13,641	7,574	8,441	12,294	11,733	Dividends paid	(1,153)	(2,017)	(2,857)	(4,160)	(3,970)
% change Y/Y	-19%	-44%	11%	46%	-5%	Beginning cash	1,258	7,934	12,764	2,500	2,625
Shares Outstanding	341	341	341	341	341	Ending cash	7,934	12,764	2,500	2,625	2,756
EPS (adjusted)	40.1	22.2	24.8	36.1	34.4		.,	,	_/	_,	
% change Y/Y	-19%	-44%	11%	46%	-5%						
Balance sheet						Ratio Analysis					
	FY08	FY09	FY10E	FY11E	FY12E	%, year-end Mar	FY08	FY09	FY10E	FY11E	FY12E
Cash and cash equivalents	7,934	12,764	2,500	2,625	2,756	EBITDA margin	1.8%	2.5%	2.1%	2.5%	2.7%
Accounts receivable	21,080	24,920	21,174	24,353	24,468	EBIT margin	0.9%	1.7%	1.3%	1.8%	1.7%
Inventories	126,432	91,163	123,515	133,940	126,419	Net profit margin	1.2%	0.6%	0.7%	0.9%	0.8%
Others	51,794	45,310	41,853	16,853	16,853						
Current assets	199,306	161,392	186,542	175,146	167,741						
						Sales growth	17.1%	17.5%	-5.1%	15.0%	0.5%
Total Investments	58,692	128,274	80,000	55,000	40,000	Net profit growth	-18.5%	-44.5%	11.5%	45.6%	-4.6%
Net fixed assets	165,017	191,169	217,406	246,072	247,037						
Liabilities	127,413	112,294	118,188	130,334	132,843						
Provisions	6,220	12,371	8,554	10,058	10,088						
Total current liabilities	133,633	124,665	126,742	140,392	142,932	Interest coverage (x)	1.2	1.0	1.1	1.7	1.9
Total assets	297,316	368,934	359,705	338,452	314,603	Net debt to total capital	56%	62%	62%	57%	51%
						Net debt to equity	99%	89%	122%	111%	92%
Total debt	172,999	240,612	225,420	196,033	164,422	Sales/assets	370%	350%	341%	417%	451%
Other liabilities	16,706	16,893	17,271	17,271	17,271	Assets/equity	276%	331%	307%	270%	237%
Total liabilities	189,704	257,505	242,691	213,304	181,693	ROE	13.4%	6.9%	7.4%	10.2%	9.1%
Shareholders' equity	107,611	111,429	117,014	125,148	132,910	ROCE	9.3%	9.9%	8.0%	10.0%	9.7%
		327.2	343.6	367.5							

Source: J.P. Morgan estimates, Company data.

## Table 9: IOC: Summary financials

Profit and Loss statement						Cash flow statement					
Rs in millions, year-end Mar	FY08	FY09	FY10E	FY11E	FY12E		FY08	FY09	FY10E	FY11E	FY12E
Revenues	2,449,691	3,055,271	2,766,621	3,130,453	3,188,531	EBIT	74,315	47,202	125,969	111,532	116,967
% change Y/Y	14%	25%	-9%	13%	2%	Depreciation & amortisation	27,097	28,817	27,700	34,439	36,364
						Change in working capital	(90,518)	91,468	(54,723)	(65,788)	1,992
EBITDA	101,412	76,019	153,669	145,972	153,332	Taxes	(31,127)	(12,851)	(26,747)	(23,385)	(24,837)
% change Y/Y	-15%	-25%	102%	-5%	5%	Others					
EBITDA Margin (%)	4%	2%	6%	5%	5%	Cash flow from operations	(20,233)	154,636	72,199	56,799	130,487
EBIT	74,315	47,202	125,969	111,532	116,967	Capex	(68,872)	(139,042)	(101,990)	(35,000)	(35,000)
% change Y/Y	-20%	-36%	167%	-11%	5%	Change in investments	(15794)	(106921)	91185	49900	49900
EBIT Margin (%)	3%	2%	5%	4%	4%	Interest (other income)	26,489	(3,916)	7,767	5,392	7,216
Net financial income	26,489	(3,916)	7,767	5,392	7,216	Free cash flow	(78,411)	(95,242)	69,161	77,090	152,603
Earnings before tax	100,804	43,286	133,736	116,924	124,183						
% change Y/Y	-4%	-57%	209%	-13%	6%	Equity raised/ (repaid)	-		-	-	
Тах	31,178	13,790	37,446	32,739	34,771	Debt raised/ (repaid)	87,748	91,145	(26,122)	(47,724)	(121,380)
as % of EBT	-31%	-32%	-28%	-28%	-28%						
Net Income (adjusted)	69,626	29,496	96,290	84,186	89,412	Dividends paid	(14,795)	(9,981)	(32,585)	(28,488)	(30,257)
% change Y/Y	-7%	-58%	226%	-13%	6%	Beginning cash	9,260	8,244	7,980	8,778	9,656
Shares Outstanding	2385	2385	2428	2428	2428	Ending cash	8,244	7,980	8,778	9,656	10,622
EPS (adjusted)	29.2	12.4	39.7	34.7	36.8	5					
% change Y/Y	-7%	-58%	221%	-13%	6%						
Balance sheet						Ratio Analysis					,
	FY08	FY09	FY10E	FY11E	FY12E	%, year-end Mar	FY08	FY09	FY10E	FY11E	FY12E
Cash and cash equivalents	8,244	7,980	8,778	9,656	10,622	EBITDA margin	4.1%	2.5%	5.6%	4.7%	4.8%
Accounts receivable	68,205	59,379	60,638	68,613	69,886	EBIT margin	3.0%	1.5%	4.6%	3.6%	3.7%
Inventories	309,415	251,496	303,191	385,946	393,107	Net profit margin	2.8%	1.0%	3.5%	2.7%	2.8%
Others	143,449	126,497	128,817	131,183	133,596						
Current assets	521,069	437,372	492,646	585,742	596,588						
						Sales growth	14.0%	24.7%	-9.4%	13.2%	1.9%
Total Investments	215,773	322,693	231,508	181,608	131,708	Net profit growth	-7.2%	-57.6%	226.5%	-12.6%	6.2%
Net fixed assets	419,420	529,645	603,935	604,496	603,131						
Liabilities	328,964	327,546	312,723	342,569	353,494						
Provisions	16,846	26,035	41,410	38,871	40,784						
Total current liabilities	345,810	353,580	354,132	381,439	394,277	Interest coverage (x)	4.8	1.2	4.8	4.7	6.2
Total assets	818,697	944,110	982,736	1,000,063	947,772	Net debt to total capital	16%	13%	19%	18%	12%
						Net debt to equity	33%	27%	37%	34%	18%
Total debt	358,575	449,721	423,598	375,874	254,494	Sales/assets	299%	324%	282%	313%	336%
Other liabilities	53,848	54,736	65,435	74,789	84,724	Assets/equity	200%	215%	199%	182%	156%
Total liabilities	412,423	504,457	489,033	450.663	339,218	ROE	18.4%	6.9%	20.6%	16.1%	15.4%
Shareholders' equity	409,617	439,602	493,703	549,400	608,555	ROCE	16.8%	10.0%	17.7%	15.3%	16.0%
BVPS	409,017	439,002	203.3	226.2	250.6	NOCL	10.070	10.070	17.770	10.070	10.076
DVFS	171.8	184.3	203.3	220.2	200.0						

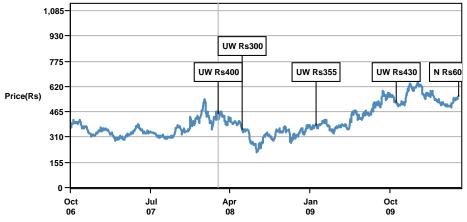
Source: J.P. Morgan estimates, Company data.

#### **Analyst Certification:**

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### **Important Disclosures**

- Client of the Firm: Bharat Petroleum Corporation (BPCL) is or was in the past 12 months a client of JPMSI; during the past 12 months, JPMSI provided to the company non-investment banking securities-related services and non-securities-related services. Hindustan Petroleum Corporation (HPCL) is or was in the past 12 months a client of JPMSI; during the past 12 months, JPMSI provided to the company non-investment banking securities-related services and non-securities-related services. Indian Oil Corporation is or was in the past 12 months a client of JPMSI; during the past 12 months, JPMSI provided to the company non-investment banking securities-related services and non-securities-related services. Indian Oil Corporation is or was in the past 12 months a client of JPMSI; during the past 12 months, JPMSI provided to the company non-investment banking securities-related services.
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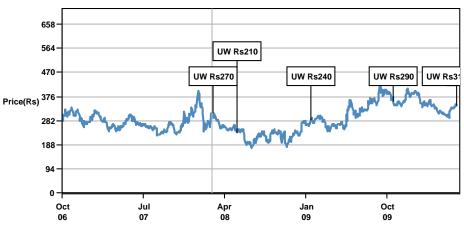


Bharat Petroleum Corporation (BPCL) (BPCL.BO) Price Chart

Date	Rating	Share Price (Rs)	Price Target (Rs)
21-Feb-08	UW	451.30	400.00
13-May-08	UW	358.10	300.00
19-Jan-09	UW	384.10	355.00
23-Oct-09	UW	521.85	430.00
24-May-10	Ν	559.75	600.00

Source: Bloomberg and J.P. Morgan; price data adjusted for stock splits and dividends. Break in coverage May 18, 2004 - Jun 22, 2004, and Oct 13, 2005 - Feb 20, 2008. This chart shows J.P. Morgan's continuing coverage of this stock; the current analyst may or may not have covered it over the entire period. J.P. Morgan ratings: OW = Overweight, N = Neutral, UW = Underweight. Hindustan Petroleum Corporation (HPCL) (HPCL.BO) Price Chart

Asia Pacific Equity Research 24 May 2010



Date	Rating	Share Price (Rs)	Price Target (Rs)
21-Feb-08	UW	311.65	270.00
13-May-08	UW	237.15	210.00
19-Jan-09	UW	286.45	240.00
23-Oct-09	UW	358.00	290.00
24-May-10	UW	342.95	315.00

Source: Bloomberg and J.P. Morgan; price data adjusted for stock splits and dividends. Break in coverage May 18, 2004 - Jun 22, 2004, and Oct 13, 2005 - Feb 20, 2008. This chart shows J.P. Morgan's continuing coverage of this stock; the current analyst may or may not have covered it over the entire period. J.P. Morgan ratings: OW = Overweight, N = Neutral, UW = Underweight.

Indian Oil Corporation (IOC.BO) Price Chart



Rating	Share Price (Rs)	Price Target (Rs)
Ν	278.27	305.00
Ν	209.25	242.50
Ν	218.75	237.50
UW	323.77	272.50
Ν	325.15	380.00
	N N N UW	(Rs)     N   278.27     N   209.25     N   218.75     UW   323.77

Source: Bloomberg and J.P. Morgan; price data adjusted for stock splits and dividends.

Break in coverage May 20, 2004 - Feb 20, 2008. This chart shows J.P. Morgan's continuing coverage of this stock; the current analyst may or may not have covered it over the entire period.

J.P. Morgan ratings: OW = Overweight, N = Neutral, UW = Underweight.

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Coverage Universe: **Pradeep Mirchandani, CFA:** Bharat Petroleum Corporation (BPCL) (BPCL.BO), Cairn India Limited (CAIL.BO), Essar Oil Ltd. (ESRO.BO), Gas Authority of India Limited (GAIL.BO), Gujarat Gas Ltd (GGAS.BO), Gujarat

State Petronet Ltd. (GSPT.BO), Hindustan Petroleum Corporation (HPCL) (HPCL.BO), Indian Oil Corporation (IOC.BO), Indraprastha Gas (IGAS.BO), Oil and Natural Gas Corporation (ONGC.BO), Petronet LNG Ltd. (PLNG.BO), Reliance Industries Ltd (RELI.BO)

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	Overweight	Neutral	Underweight
	(buy)	(hold)	(sell)
JPM Global Equity Research Coverage	45%	42%	13%
IB clients*	48%	46%	32%
JPMSI Equity Research Coverage	42%	49%	10%
IB clients*	70%	58%	48%

\*Percentage of investment banking clients in each rating category.

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