

Daily Derivatives Report



Nifty Futures

	Value	Change
Most recent settlement	26,145	0.5%▲
Open Interest (OI)	1,81,94,845	0.3%▲
Change in OI (abs)	1,81,94,845	58,170▲
Premium / Discount (Abs)	98	13▼
Inference	Long Build Up	

Bank Nifty Futures

	Value	Change	
Most recent settlement	59,658	0.3%▲	
Open interest (OI)	19,40,935	2.6%▼	
Change in OI (abs)	19,40,935	52,220▼	
Premium / Discount (Abs)	268	18▼	
Inference	Short Covering		

Volatility Insights

	Value	Change
India VIX Index	10.11	0.29▼
Nifty ATM IV (%)	8.54	0.71 ▼
Bank Nifty ATM IV (%)	9.50	0.45▼
PCR (Nifty)	1.15	0.21 ▲
PCR (Bank Nifty)	0.90	0.03 ▲

The FII Long Ratio in Index Futures drop to 10 %, down from 11.4 % in the previous session.

Single Stock Futures Movers

Long Buildup (Open Interest Higher + Price Higher)							
Symbol	Open Interest	Chg (%)	Price	Chg (%)			
HINDZINC	3,76,30,775	11.6%	563	7.3%			
MUTHOOTFIN	29,49,375	8.1%	3852.4	2.9%			
NUVAMA	3,54,800	6.0%	7389	1.6%			
PPLPHARMA	2,61,22,500	5.8%	175.33	1.5%			
IIFL	1,25,13,600	5.7%	583	2.3%			

Short Buildup (Open Interest Higher + Price Lower)							
Symbol	Open Interest	Chg (%)	Price	Chg (%)			
HINDUNILVR	99,57,900	44.0%	2265.2	-2.2%			
PIIND	27,06,375	14.0%	3278.6	-3.1%			
SIEMENS	29,88,425	13.8%	3149.2	-1.7%			
JUBLFOOD	1,93,36,250	5.5%	583.85	-2.6%			
LAURUSLABS	1,62,29,900	4.8%	1018.4	-0.5%			

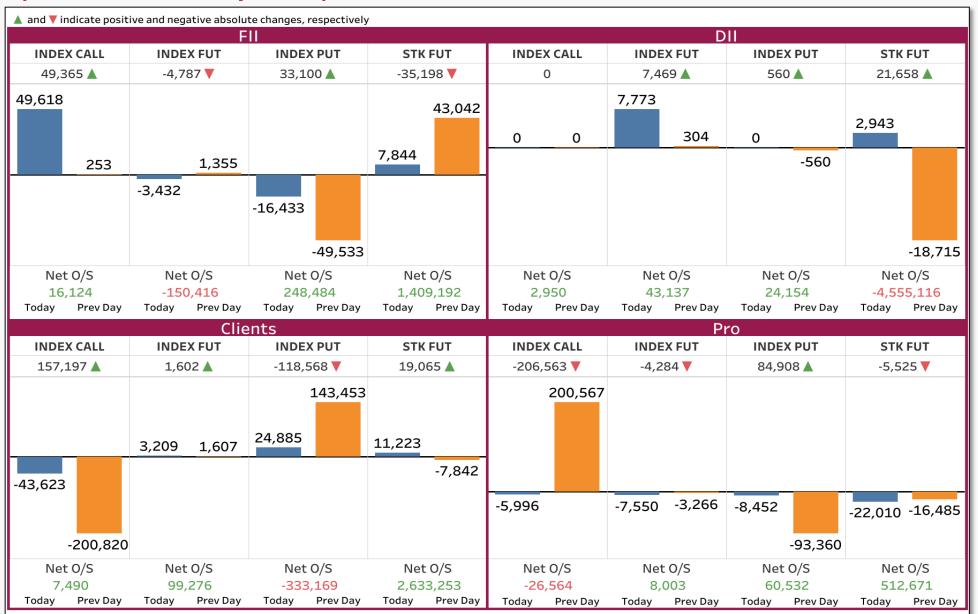
Short Covering (Open Interest Lower + Price Higher)							
Symbol	Open Interest	Chg (%)	Price	Chg (%)			
SRF	39,16,000	-6.5%	3029.9	2.6%			
KAYNES	35,37,000	-5.9%	4284	5.5%			
ABB	26,26,125	-4.8%	5296	0.7%			
CYIENT	33,01,400	-4.6%	1170	1.0%			
SAMMAANCAP	9,42,00,100	-4.3%	149.83	3.6%			

Long Unwinding (Open Interest Lower + Price Lower)							
Symbol	Open Interest	Chg (%)	Price	Chg (%)			
EICHERMOT	31,59,525	-1.9%	7258.5	-0.2%			
SUNPHARMA	1,47,73,150	-0.9%	1801.3	-0.5%			
HCLTECH	1,70,80,350	-0.8%	1675	0.0%			
KOTAKBANK	3,96,64,800	-0.6%	2185.7	0.0%			
CONCOR	3,96,55,000	-0.4%	507.25	-0.3%			

For an explanation of all the contents in this report, kindly click on the hyperlink at the top right which will take you to the end-of-report appendix

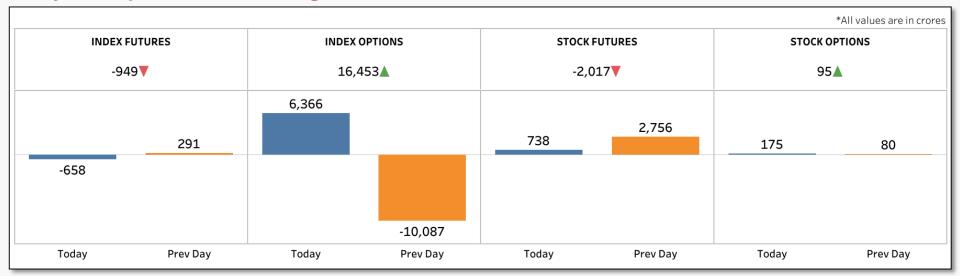


Open Interest Trends by Participant

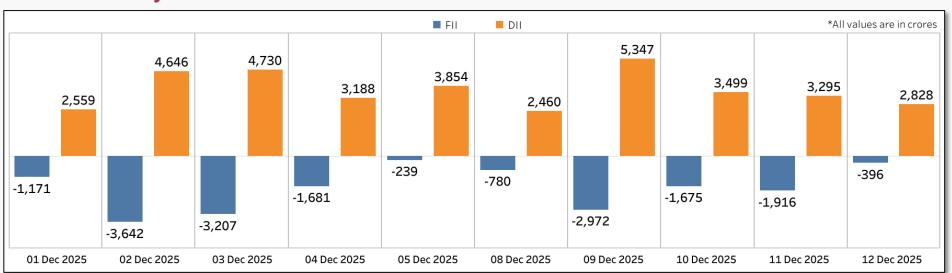




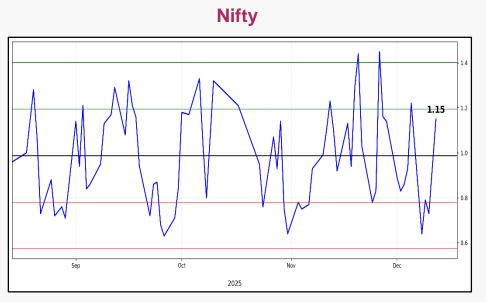
Daily Net Open Interest Change



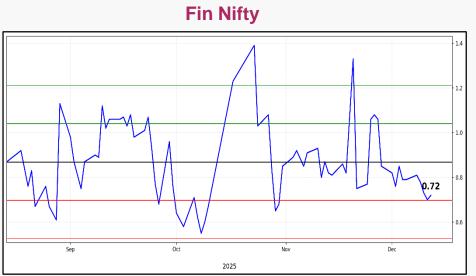
DII and FII Daily Cash Market Flows

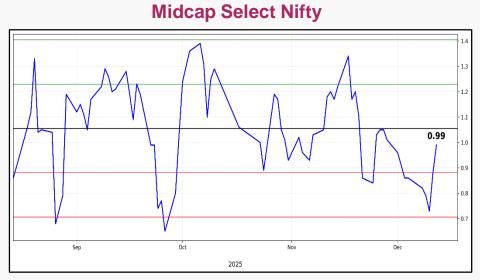








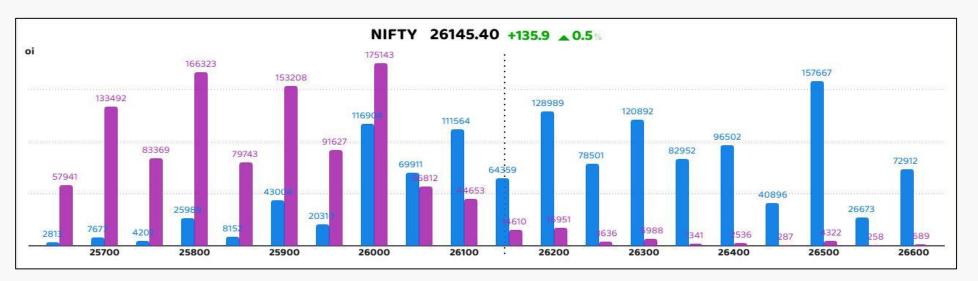




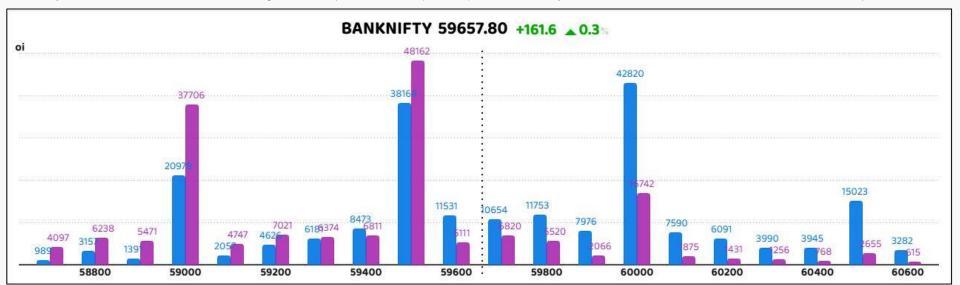


Positioning Stack by Strike (Nifty Current Week Expiry & BankNifty Monthly Expiry)





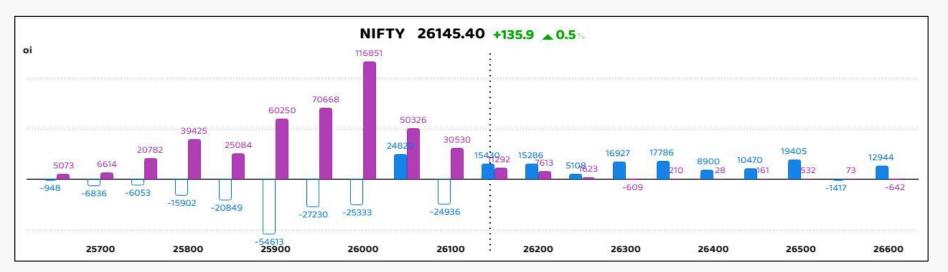
For Nifty, the 26,500 Call and 26,000 Put had the highest call and put concentration (contracts). For the Bank Nifty, the 60,000 Call and the 59,500 Put saw the most amount of open interest.



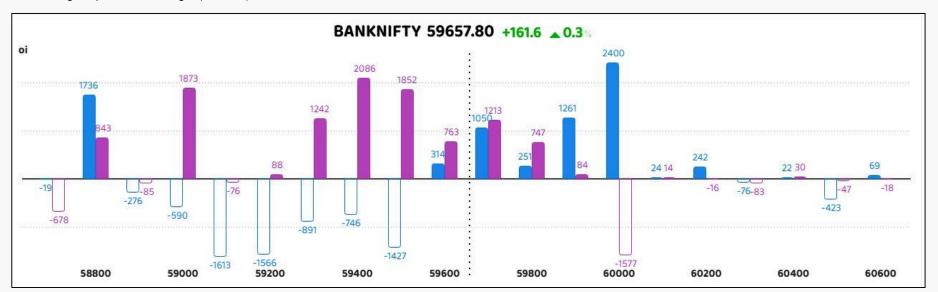


Open Interest Change (Nifty Current Week Expiry & BankNifty Monthly Expiry)





The largest open interest changes (contracts) were seen at the 25,900 Call and the 26,000 Put





Stocks with High IVR:

Ticker	Last Px	Chg (%)	30d IV	30d IV High	30d IV Low	IVR (1m/1y)
HINDUSTAN UNILEV	2,260.6	-2.0	17.7	25.8	0.8	67.5
INTERGLOBE AVIAT	4,860.5	0.9	30.9	43.2	13.2	59.0
ICICI LOMBARD GE	1,937.9	-0.1	23.8	38.2	3.2	58.7
KOTAK MAHINDRA	2,176.6	-0.2	18.9	32.4	1.1	57.1
HDFC BANK LTD	1,001.5	0.1	15.8	28.0	1.5	54.0

Stocks with Low IVR:

Ticker	Last Px	Chg (%)	30d IV	30d IV High	30d IV Low	IVR (1m/1y)
CIPLA LTD	1,517.4	0.3	1.3	34.7	1.3	0.0
DR REDDY'S LABS	1,279.3	0.5	10.9	39.7	10.9	0.0
ASHOK LEYLAND	163.9	2.2	20.6	56.0	20.6	0.0
NTPC LTD	325.1	0.8	15.7	116.6	14.9	0.8
GAIL INDIA LTD	170.7	1.0	20.9	91.4	19.8	1.6



Stocks With High IVP:

Ticker	Last Px	Chg (%)	30d IV	30d IV High	30d IV Low	IVP (1m/1y)
KAYNES TECHNOLOG	4,265.5	5.5	50.5	62.9	30.3	97.5
INTERGLOBE AVIAT	4,860.5	0.9	30.9	43.2	13.2	77.4
HINDUSTAN ZINC	561.7	7.5	34.9	54.2	21.8	68.5
VODAFONE IDEA LT	11.6	3.5	59.9	212.9	10.0	52.8
ICICI LOMBARD GE	1,937.9	-0.1	23.8	38.2	3.2	49.1

Stocks With Low IVP:

Ticker	Last Px	Chg (%)	30d IV	30d IV High	30d IV Low	IVP (1m/1y)
CIPLA LTD	1,517.4	0.3	1.3	34.7	1.3	0.0
DR REDDY'S LABS	1,279.3	0.5	10.9	39.7	10.9	0.0
ASHOK LEYLAND	163.9	2.2	20.6	56.0	20.6	0.0
BLUE STAR LTD	1,796.7	2.9	20.4	40.0	20.4	0.0
NHPC LTD	77.1	0.6	22.8	53.0	21.6	0.9



Stocks With High Call Volume To Put Volume

Ticker	Last Px	Chg (%)	Total Call Vol	Total Put Vol	Call to Put Vol
CROMPTON	254.1	1.0	7,316	1,243	5.9
ICICIPRULI	647.6	1.8	8,233	1,603	5.1
HDFCLIFE	777.5	0.3	25,286	5,033	5.0
YESBANK	21.9	-0.1	7,311	1,539	4.8
BRITANNIA	5,915.5	1.2	6,676	1,443	4.6

Stocks With High Put Volume To Call Volume

Ticker	Last Px	Chg (%)	Total Call Vol	Total Put Vol	Put to Call Vol
OFSS	7,990.0	-0.2	12,920	17,945	1.4
PIIND	3,311.1	-1.9	16,902	18,794	1.1
JUBLFOOD	583.6	-2.4	14,978	15,336	1.0
SIEMENS	3,144.6	-1.6	1,01,012	80,733	0.8
KFINTECH	1,051.7	-2.1	5,078	4,015	0.8



Call Open Interest Relative to Record High

Ticker	Last Px	Chg (%)	Total Call Ol	Highest Call OI	Relative to Highest Call OI
BEL	389.4	0.5	60,458	59,900	100.0
HFCL	66.6	-0.4	11,381	11,002	100.0
INDIANB	789.4	0.9	11,165	11,039	100.0
INDIGO	4,860.5	0.9	1,25,300	1,24,879	100.0
LODHA	1,091.1	1.0	10,446	10,445	100.0

Put Open Interest Relative to Record High

Ticker	Last Px	Chg (%)	Total Put OI	Highest Put OI	Relative to Highest Put OI
HINDZINC	561.6	7.5	25,898	18,224	100.0
TMPV	347.4	0.2	41,496	41,434	100.0
TIINDIA	2,655.6	0.2	4,689	4,700	99.8
INOXWIND	124.6	2.5	7,144	7,173	99.6
KAYNES	4,265.5	5.5	31,971	32,126	99.5



Call Volume Relative to Record High

Ticker	Last Px	Chg (%)	Total Call Vol	Highest CV	Relative to Highest CV
HINDZINC	561.6	7.5	2,84,880	1,08,867	100.0
JSWENERGY	482.2	5.3	56,111	80,838	69.4
DALBHARAT	2,072.2	4.3	28,705	48,778	58.8
KAYNES	4,265.5	5.5	1,96,605	3,48,571	56.4
HINDALCO	852.1	3.4	85,092	1,72,022	49.5

Put Volume Relative to Record High

Ticker	Last Px	Chg (%)	Total Put Vol	Highest PV	Relative to Highest PV
HINDZINC	561.6	7.5	94,741	48,254	100.0
HINDALCO	852.1	3.4	40,886	89,155	45.9
SIEMENS	3,144.6	-1.6	80,733	1,85,843	43.4
JSWENERGY	482.2	5.3	19,443	51,097	38.1
TATASTEEL	171.9	3.3	29,517	79,864	37.0



Call Open Interest to 20-day Average

Ticker	Last Px	Chg (%)	Total Call OI	Avg OI Call 20D	20D Call OI Ratio
INDIGO	4,860.5	0.9	1,25,300	36,639	3.4
KAYNES	4,265.5	5.5	77,743	39,551	2.0
SIEMENS	3,144.6	-1.6	18,799	9,775	1.9
TIINDIA	2,655.6	0.2	7,465	4,079	1.8
HINDZINC	561.6	7.5	32,844	18,262	1.8

Put Open Interest to 20-day Average

Ticker	Last Px	Chg (%)	Total Put OI	Avg OI Put 20D	20D Put OI Ratio
HINDZINC	561.6	7.5	25,898	9,978	2.6
INDIGO	4,860.5	0.9	57,319	22,171	2.6
KAYNES	4,265.5	5.5	31,971	15,185	2.1
DIXON	13,379.0	3.0	37,084	19,587	1.9
TIINDIA	2,655.6	0.2	4,689	2,529	1.9



Call Volume Relative to 20-day Average

Ticker	Last Px	Chg (%)	Total Call Vol	Avg Vol Cal 20D	20D Call Vol Ratio
HINDZINC	561.6	7.5	2,84,880	30,611	9.3
DALBHARAT	2,072.2	4.3	28,705	4,167	6.9
PNBHOUSING	937.1	4.1	42,784	6,511	6.6
JSWENERGY	482.2	5.3	56,111	16,602	3.4
NATIONALUM	278.2	5.2	31,559	9,811	3.2

Put Volume Relative to 20-day Average

Ticker	Last Px	Chg (%)	Total Put Vol	Avg Vol Put 20D	20D Put Vol Ratio
HINDZINC	561.6	7.5	94,741	11,219	8.4
PNBHOUSING	937.1	4.1	17,426	3,085	5.6
SIEMENS	3,144.6	-1.6	80,733	14,809	5.5
DALBHARAT	2,072.2	4.3	8,368	2,036	4.1
PIIND	3,311.1	-1.9	18,794	6,003	3.1



Nifty 50 Constituents Open Interest (OI) Dashboard – Support / Resistance

Distance of Strike With Highest Open Interest From Current Market Price (%)

Stock Name	CE STRIKE	CE OI	%Away	CMP	PE Strike	PE OI	%Away	Stock Name	CE STRIKE	CE OI	%Away	CMP	PE Strike	PE OI	%Away
ADANIENT	2300	2381154	0.8%	2282	2300	1094169	0.8%	JIOFIN	310	10210750	3.1%	301	300	6349700	-0.2%
ADANIPORTS	1600	1920900	5.1%	1523	1500	864975	-1.5%	JSWSTEEL	1200	3598425	6.6%	1126	1100	1604475	-2.3%
APOLLOHOSP	7500	378875	5.6%	7101	7000	131500	-1.4%	KOTAKBANK	2200	1592400	1.1%	2177	2000	1050800	-8.1%
ASIANPAINT	3000	1344000	8.5%	2765	2600	507500	-6.0%	LT	4200	688975	3.1%	4074	4000	510825	-1.8%
AXISBANK	1290	3661875	0.3%	1286	1280	1174375	-0.5%	M&M	3800	1068200	3.3%	3680	3700	461200	0.6%
BAJAJ-AUTO	9100	255375	0.9%	9015	9000	154725	-0.2%	MARUTI	16500	259050	-0.1%	16522	16000	212250	-3.2%
BAJAJFINSV	2100	1019750	0.8%	2083	2000	412250	-4.0%	MAXHEALTH	1100	874650	1.7%	1081	1160	442575	7.3%
BAJFINANCE	1100	3546000	8.1%	1017	1020	1916250	0.3%	NESTLEIND	1320	2610500	6.6%	1238	1160	284000	-6.3%
BEL	420	14183025	7.8%	389	410	4284975	5.3%	NTPC	325	7411500	0.0%	325	320	2002500	-1.6%
BHARTIARTL	2100	2917925	0.8%	2083	2100	1132400	0.8%	ONGC	250	9960750	5.0%	238	240	1856250	0.8%
CIPLA	1600	897000	5.4%	1517	1400	514500	-7.7%	POWERGRID	280	6296600	6.2%	264	260	2502300	-1.4%
COALINDIA	400	2014200	4.3%	383	440	1590300	14.8%	RELIANCE	1600	9833000	2.8%	1557	1500	3082000	-3.6%
DRREDDY	1300	2245000	1.6%	1279	1140	384375	-10.9%	SBILIFE	2040	964125	0.7%	2026	2020	326250	-0.3%
EICHERMOT	7300	362425	1.0%	7229	6300	236075	-12.9%	SBIN	1000	9869250	3.8%	963	950	2906250	-1.4%
ETERNAL	310	15769775	4.0%	298	290	6050375	-2.7%	SHRIRAMFIN	880	2664750	3.8%	848	800	1618650	-5.7%
GRASIM	2800	489500	-1.3%	2837	2700	567500	-4.8%	SUNPHARMA	1840	2051000	2.6%	1794	1780	272650	-0.8%
HCLTECH	1720	1059100	2.8%	1673	1440	503650	-13.9%	TATACONSUM	1200	1823250	4.4%	1149	1070	380050	-6.9%
HDFCBANK	1000	4943400	-0.1%	1002	1000	3562350	-0.1%	TMPV	400	11661600	15.1%	347	350	5016000	0.7%
HDFCLIFE	800	5297600	2.9%	778	700	1439900	-10.0%	TATASTEEL	180	24579500	4.7%	172	170	15339500	-1.1%
HINDALCO	800	2017400	-6.1%	852	780	1335600	-8.5%	TCS	3200	1138725	-0.6%	3221	3000	555625	-6.8%
HINDUNILVR	2300	1182300	1.7%	2261	2300	478800	1.7%	TECHM	1600	967200	1.4%	1578	1540	454800	-2.4%
ICICIBANK	1400	8338400	2.5%	1366	1400	3507000	2.5%	TITAN	4000	567700	3.1%	3880	3800	442925	-2.1%
INDIGO	5500	2319000	13.2%	4861	4500	853050	-7.4%	TRENT	4300	950600	5.5%	4075	4000	369800	-1.9%
INFY	1600	8368800	0.1%	1598	1600	2725600	0.1%	ULTRACEMCO	12000	139250	2.4%	11723	10800	89200	-7.9%
ITC	410	10843200	2.5%	400	390	8827200	-2.5%	WIPRO	260	6180000	-0.2%	261	250	3288000	-4.1%



- Open interest goes up when both the buyer and the seller are opening a new position
- Open interest remains the **same** when one party is **opening a new position** and the other is **liquidating an existing position**
- Open interest falls when both the buyer and the seller are liquidating existing positions
- Long build up: Prices increase with a rise in open interest and is considered bullish
- Long liquidation: Existing longs liquidate their positions and open interest also falls; moderately bearish
- Short build up: Prices drop with a rise in open interest, and this is considered bearish
- Short covering: Existing shorts cover their positions, and open interest drop; this is moderately bullish
- PCR goes up when 1) both put and call open interest go up, but puts rise faster, or 2) both put and call open interest go down, but calls fall faster or, 3) when puts go up and calls go down
- Generally, a **rising PCR is bearish**, but when it reaches an extremely **high** reading, it means people are likely to take contrarian bets, i.e., they are likely to turn **bullish**
- PCR goes down when 1) both put and call open interest go up, but calls rise faster, or 2) both put and call open interest go down, but puts fall faster or, 3) when puts go down and calls go up
- Typically, a falling PCR is bullish, but when it reaches an extremely low reading, it means people are likely to take contrarian bets, i.e., they are likely to turn bearish

^{*}ATM IV is the midpoint of the IV for the ATM call and put respectively

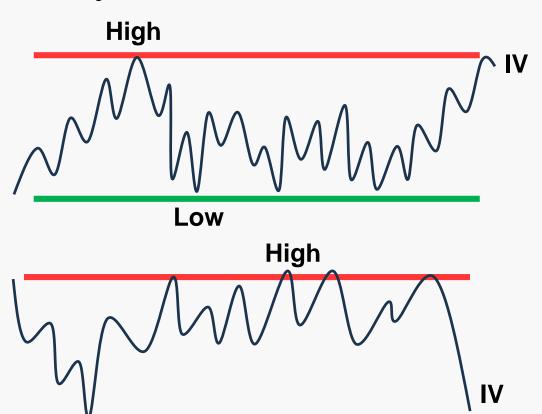


- Volume: Number of contracts traded for the day. If A bought 10 calls & B sold 10 calls, the volume for the day is 10 contracts
- Open Interest: The number of derivatives contracts that are open (have not been closed out). If A bought 10 calls, B bought another 10 calls and C sold 20 calls, then the open interest for the day is 20 contracts
- Total open interest: Total of all open positions for all available expirations. It is the sum of all outstanding long positions OR short positions. This is because the total number of long positions must equal the total number of short positions
- **Premium:** When the front-month futures are more expensive than the cash market price. For instance, if Nifty futures (first month contract) are at 25,500 when the cash Nifty is at 25,450, the premium is 50 points
- **Discount:** When the front-month futures are cheaper than the cash market price. For instance, if Tata Steel futures (first month contract) are at 160 when the stock is trading at 162 in the cash market, the discount is 2 points
- At-the-Money (ATM): When the strike price of an option is the same as the spot price, the option is called an ATM option
- Implied Volatility (IV): Measure of how much a stock is expected to move in the future (in either direction)
- Put-Call Ratio (PCR): Ratio of total number of outstanding puts to total number of calls outstanding. If this ratio is more (less) than one, it means more puts (calls) are open relative to calls (puts)
- **Derivatives market participants:** Foreign Institutional Investors (FIIs), Domestic Institutional Investors (DIIs), proprietary traders and Retail investors
- Derivatives Instruments: Index options, index futures, stock options, stock futures
- Expirations covered: Index options (weekly, monthly), stock options, stock futures and index futures (monthly)
- For pages 7 to 11, "Last px" refers to the closing price of the cash market ticker
- Source(s): www.nseindia.com, Bloomberg, MyFnO



Low

- Strike concentration: Visual representation of how many calls and puts are outstanding at each strike in the vicinity of the current underlying price. The strike with the highest call open interest is considered as resistance, while the put strike with the highest number of outstanding positions is considered as support
- Shifting concentration: Strikes with highest call and put concentration are dynamic in nature and keep changing as per movements in the markets
- Implied Volatility Rank (IVR): Measure of how expensive or cheap the IV of an ATM option is, relative to its 12-month history. The reading oscillates between 0 and 100



Assume the wavy line is IV over the last one year. Notice that today's IV is close to the highest high seen in the last one year. This means that IV for this option is expensive compared to where it's been in the last 12 months.

In this chart, notice that today's IV is close to the lowest low seen in the last 12 months. This means that IV for this option is cheap today compared to where it has traded over the last one year.



• Implied Volatility Percentile (IVP): Measures the number of days IV has been below the current IV in the last 252 trading days. The reading moves between 0 and 100.



In the chart to the left, one can see that the bulk of the time the IV has been below its current level. In this case, the IVP will be close to 100. An IVP of 100 means that 100% of the time IV has been below its current reading in the last one year.

Notice that IV has mostly traded at the high end of its one-year range, and there have been very few values below the current IV. In such a scenario, the IVP is going to be close to 0. An IVP of say, 5, means that IV has been below the current IV only 5% of the time in the last 252 trading sessions.



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