

Energy  
Oil & Gas - Exploration & Production  
United Kingdom

## Aurelian Oil and Gas (LSE: AUL LN)

**Initiating Coverage: Cheap Valuation with Material Newsflow Potential**

### Initiating Coverage

Rating: BUY  
Price: 14p  
Price Target: 19p  
Exchange Rate: 1.3300  
Bloomberg: LSE: AUL LN

### Market Data

52-Week Range: 34p-12p  
Total Entprs. Value (MM): £28.8  
Market Cap. (MM): £31.4  
Shares Out. (MM): 232.4  
Float (MM): 140.4  
Avg. Daily Vol.: 100000

### Financial Summary

Net Debt (MM): (€3.4)

EUR	2008A	2009E	2010E	2011E
Rev. (MM)	190.0	280.0	330.0	510.0
EV/Rev.	0.2x	0.1x	0.1x	0.1x

### EPS

FY Dec	(3.26)	(2.60)	(0.31)	(0.77)
FY P/E	NM	NM	NM	NM

### William Arnstein, Equity Analyst

44 (0) 20 7029 8272, warnstein@Jefferies.com

### Investment Summary

We expect Siekierki farm-out negotiations to conclude shortly, which along with results from the high-impact Voitinel prospect could lead to a material re-rating. L-T testing of the Siekierki field to begin in 2010 targeting large upside potential and de-risking full development.

### Event

We are initiating coverage with a Buy rating and 19p price target.

### Key Points

- **Appointment of new CEO.** Rowen Bainbridge joined Aurelian in August and is expected to enhance the company's focus on project execution, which given the potential scale of the Siekierki field is crucial to realising its value and upside. In addition, a more transparent approach should enable Aurelian to demonstrate the full potential of its exploration acreage.
- **Siekierki farm-out decision expected shortly.** Securing a suitable partner to fund a long-term production test on the Siekierki field is central to Aurelian's appraisal strategy, which will determine not just the commerciality of the field but also the upside potential. Testing will commence in Q1/2 2010 with production from one horizontal well flared. If results meet expectations, long-term test facilities will be constructed and a second well drilled in a different structural segment of the field with production sold into the local market.
- **Siekierki gas in place range highlights significant upside potential.** Following interpretation of 3D seismic data acquired in 2008 gas in place estimates were upgraded substantially, however, the large range between the P90 and P10 estimates demonstrates significant uncertainty as well as considerable upside potential. The L-T production test should help narrow and de-risk these estimates enabling a decision on full development to be taken in early 2011.
- **Voitinel prospect offers company-changing potential.** The Voitinel prospect is due to be drilled on the Brodina licence in Romania in September. Aurelian has a 34% working interest in the 50mmbbl prospect, and fully de-risked it could be worth as much as 79p/sh. There is a risk of gas, which while lowering the upside potential, would still be a material discovery.

### Valuation/Risks

Our DCF-derived total NAV for Aurelian is 31.8p/sh and is made up of a core NAV of 24.0p/sh and a risked NAV of 7.7p/sh. We set our 19p price target at a 20% discount to core NAV, reflecting financing constraints and higher-than-normal risk aversion.

With the Siekierki development contributing 83% of our core NAV, proving its commerciality and securing funding for a long-term production test and full development are important risks. Elsewhere, uncertain exploration and appraisal results provide downside risks.

## Executive Summary

We initiate coverage on Aurelian with a Buy recommendation and a 19p price target offering upside of 41%. Our positive rating is underpinned by the large Siekierki tight gas field, which has 204bcf of contingent resources and material upside potential. Providing farm-out negotiations are successful, a long-term production test is planned for 2010 that will assess some of this upside but is also crucial for full development sanction.

Due to the collapse of the previous farm-out agreement and the fall in Aurelian's market value, we believe the market has lost sight of the valuation potential of the Siekierki field. While technical risks provide some downside potential, modern technology is tried and tested on similar structures elsewhere in the world, and we believe the chances are high that a commercial development will prove viable. With newsflow expected to increase throughout the next year we believe investors should look to buy ahead of a possible re-rating as interest returns.

A more immediate and possibly larger upside is offered by the Voitinel exploration well. Aurelian has a 34% working interest in the 50mmboe prospect and results are expected in October. Fully de-risking Voitinel suggests it could be worth as much as 79.1p/sh (almost 6 times the current share price) if successful; however, a chance of gas rather than oil would lower this upside, albeit a discovery of this scale would still be a hugely significant event for Aurelian.

## Valuation

Our total net asset value (NAV) for Aurelian is 31.8p/sh and is made up of a 24.0p/sh core NAV and risked upside of 7.7p/sh. With the current share price trading 44% below our core NAV, we believe Aurelian is significantly undervalued, although with negotiations to bring a partner into the Siekierki development yet to be concluded and the outcome of a long-term production test planned for 2010 uncertain, there remains higher than average risk. Despite this we see further upside potential beyond our current core NAV if Aurelian can lower the development risk for the Siekierki field and increase recoverable resources towards the P10 case. Much of this upside will be tested in 2010.

On the exploration side, Aurelian has an active programme for the remainder of 2009 and 2010; however, of the four wells planned only Voitinel has company-changing potential. We currently value Voitinel at 6.4p/sh risked at 10%, but if successful could be worth as much as 79.1p/sh fully de-risked, making it potentially more important to Aurelian than the Siekierki development. If as mentioned above Voitinel proves to be gas rather than oil, the upside value declines to xp/sh.

### EXHIBIT 1: SUMMARY NET ASSET VALUE

	Gross unrisked reserves	Equity	Net unrisked reserves	Risk factor	Net risked reserves	NPV	Riskd NPV	Riskd NPV	Unrisked NPV
	(mmboe)	(%)	(mmboe)	(%)	(mmboe)	(US\$/boe)	(US\$m)	(p/sh)	(p/sh)
Core production	1.1	62.5%	0.7	100%	0.7	3.5	2.3	0.6	0.6
Core development	40.1	50.0%	20.1	75%	15.1	4.8	71.8	19.8	26.4
Net cash + working capital							12.8	3.5	3.5
<b>Core NAV</b>	<b>41.2</b>	<b>50.3%</b>	<b>20.7</b>	<b>75.8%</b>	<b>15.7</b>	<b>5.5</b>	<b>87.0</b>	<b>24.0</b>	<b>30.6</b>
Voitinel prospect	50.0	34%	16.9	10%	1.7	17.3	23.2	6.4	79.1
Other exploration	14.3	37%	5.3	23%	1.2	3.9	4.7	1.3	9.5
<b>Riskd NAV</b>	<b>64.3</b>	<b>34.6%</b>	<b>22.2</b>	<b>13.1%</b>	<b>2.9</b>	<b>9.6</b>	<b>28.0</b>	<b>7.7</b>	<b>88.6</b>
<b>Total NAV</b>	<b>105.5</b>	<b>40.7%</b>	<b>43.0</b>	<b>43.4%</b>	<b>18.6</b>	<b>6.2</b>	<b>115.0</b>	<b>31.8</b>	<b>119.2</b>

Source: Jefferies International Ltd.

## Risks

- With only one modern vertical well drilled on the Siekierki structure, significant technical risks typical for tight gas reservoirs (reservoir segmentation, inconsistent reservoir quality and water production) remain that could lead to resource downgrades. The drilling and long-term production test of two horizontal wells planned for 2010 aims to minimise these risks by increasing Aurelian's reservoir understanding and establishing the commercial potential of the field prior to full development sanction.
- Following the credit crunch, access to new capital has been difficult for small E&Ps (and where available more expensive) and in particular those with a focus on exploration and appraisal activities. While Aurelian successfully raised £12m via a share placing in May to fund its exploration programme, its farm-in partner in the Siekierki development pulled out, leaving its €45m share of the 2010 capex budget unfunded. Negotiations are ongoing to bring in a replacement partner; however, the terms could be less favourable which would have a negative impact on our core NAV.
- Many eastern and central European countries maintain significant control over domestic oil and gas industries and despite initiatives to comply with European laws tariffs remain that cap prices below free market levels. While some price convergence has taken place there is no guarantee that prices will continue to improve limiting the profitability of more marginal fields. In addition, many contracts are denominated in local currencies exposing Aurelian to potentially material FX risks.

## EXHIBIT 2: COMP TABLE

Company	Ticker	Rec	PT (GBp)	Close (GBp)	Upside/Downside	MV (\$m)	Core NAV (GBp)	Discount to Core NAV	Total NAV (GBp)	Discount to Total NAV	Strengths	Weakness
Afren	AFR LN	Hold	53.0	58.0	-8.6%	685	66.9	-13.3%	97.5	-40.5%	Management relationships M&A growth opportunities Unrisked upside potential	Development risk
Aurelian	AUL LN	Buy	19.0	13.5	40.7%	52	24.0	-43.8%	31.8	-57.5%	Management relationships Technical skills Operator of assets Cheap valuation Unrisked upside potential	Financing risk Appraisal risk Development risk Gas pricing
Cairn Energy	CNE LN	Buy	2,600.0	2,500.0	4.0%	5,675	3,283.1	-23.9%	3,357.9	-25.5%	Strong balance sheet Cashflow potential Cheap valuation	Development risk Limited catalysts
Dana Petroleum	DNX LN	Hold	1,000.0	1,504.0	-33.5%	2,263	1,217.6	23.5%	1,736.5	-13.4%	Strong balance sheet Exploration portfolio	Non-operator of assets Lack of production growth 2010-11
Northern Petroleum	NOP LN	Buy	153.0	132.0	15.9%	172	191.6	-31.1%	324.1	-59.3%	Strong balance sheet Cashflow potential Low risk business model Italy exploration upside Cheap valuation	Development risk Farm-out success Limited guidance Share liquidity
Premier Oil	PMO LN	Buy	1,150.0	1,378.0	-16.5%	2,605	1,445.0	-4.6%	1,695.7	-18.7%	Strong balance sheet M&A target Asia exploration potential Cheap valuation	Development risk Exploration track record
Tullow Oil	TLW LN	Hold	800.0	1,078.0	-25.8%	14,263	616.2	74.9%	1,031.9	4.5%	Management Ghana and Uganda explorati M&A target	Development risk Premium rating
Emerald Energy	EEN LN	Buy	750.0	738.5	1.6%	763	862.8	-14.4%	1,109.2	-33.4%	Strong balance sheet Capella appraisal upside Syria exploration potential Cheap valuation	Share liquidity Appraisal risk

Source: Jefferies International Ltd.

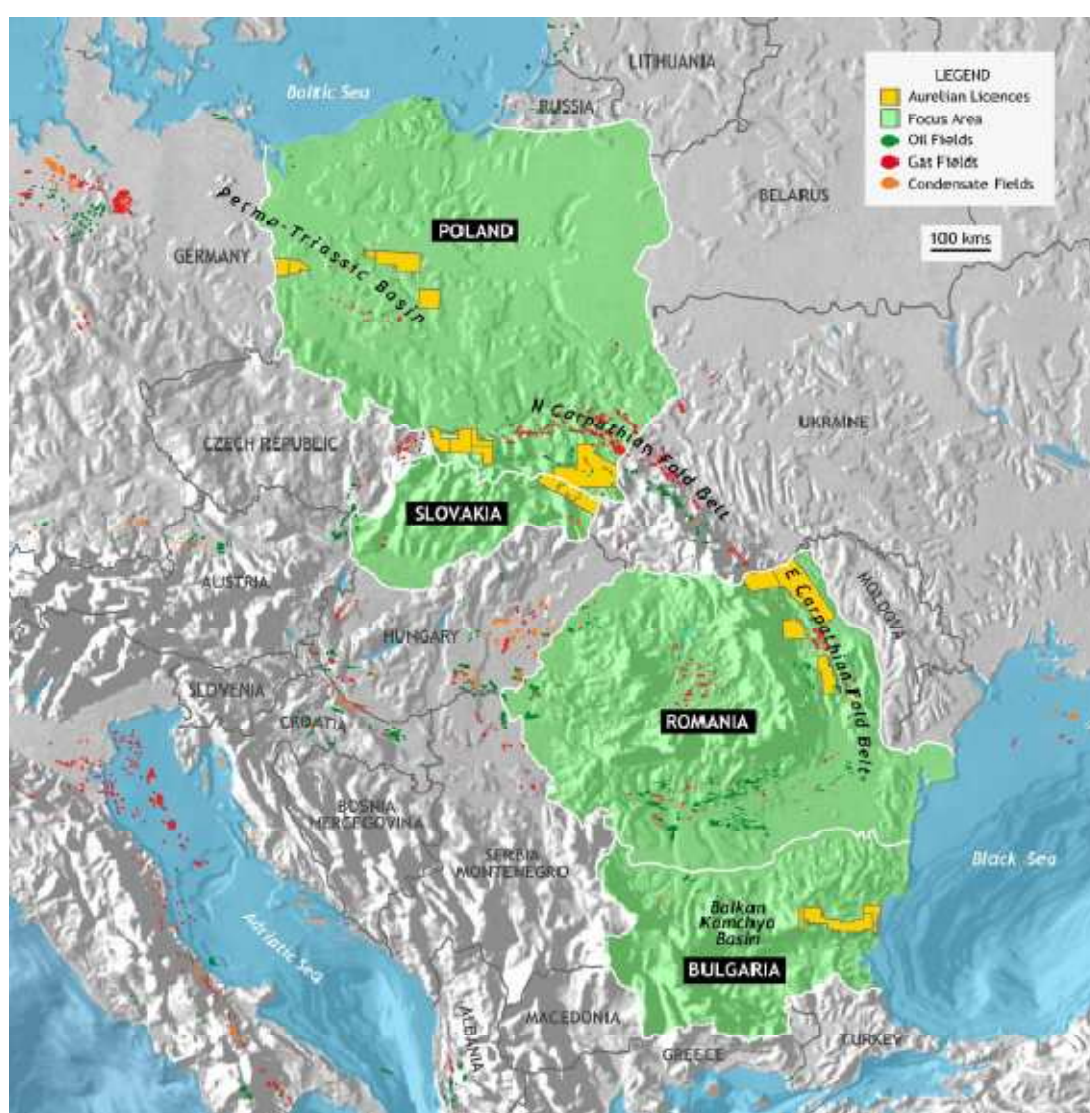
## Company Overview

Aurelian is an exploration and production company focused on central European countries including Bulgaria, Poland, Romania and Slovakia. In total it has 20 licences with a bias towards exploration and appraisal activities targeting a range of proven plays in established yet underexplored hydrocarbon provinces. The company aims to pursue an aggressive exploration programme utilising its strong technical credentials, experienced country managers and key local relationships. Importantly, Aurelian is operator of the majority of these licences and is fully funded through this phase following a share placing in May that raised £11.6m gross.

The company's main asset is its 90% working interest in the large undeveloped Siekierki tight gas field in Poland. Contingent resources are estimated at 204bcf and full development could commence in 2011 provided a long-term production test planned for 2010 proves the commerciality of the development. Aurelian is expected to farm-out a 40% interest in the field to help fund the production test and may further reduce its working interest to lower its share of full development costs.

In Romania, Aurelian has a number of small gas fields in production and three recent discoveries; however, limited reserves and low production volumes mean the emphasis remains on exploration. Activities in both Bulgaria and Slovakia are entirely focused on exploration.

### EXHIBIT 3: AURELIAN LICENCES



Source: Aurelian

## Key Assets

### Poland

#### Siekierki development

The undeveloped Siekierki field is Aurelian's most significant asset and is primarily located on the Poznan East block but also extends into the Poznan North block to the west and to the south. Aurelian holds a 90% working interest in both the Poznan East and North blocks but is seeking a partner to help fund a long-term production test ahead of full field development. The field was originally discovered in the 1970s and later appraised by three further wells that confirmed the presence of gas but also the tight nature of the reservoir. Technology limitations at the time prevented testing at commercial rates and the field was not developed. More than 20 years later tried and tested drilling and fracking technologies have been developed that Aurelian believes will enable commercial volumes to be produced.

#### EXHIBIT 4: SIEKIERKI FIELD



Source: Aurelian

Due to reservoir damage in the original wells, Aurelian drilled the Trzek-1 appraisal well in 2007 to increase its reservoir understanding. Electric logs indicated good levels of gas saturations in an 89m column within Rotliegendes sandstones and confirmed fair to moderate porosity and low permeability. Following fracture stimulation the well tested at a stable 2.5mmcfpd. Not spectacular but sufficient to believe higher rates could be achievable from horizontal production wells with multiple fracs and that a commercial development was possible.

Following these results RPS Energy compiled a competent persons report that estimated contingent resources at 211bcf. More recent interpretation of a 3D seismic data set acquired in 2008 indicated the structure was materially larger than previously thought and led Aurelian to upgrade its gas in place estimates by 41% to 513bcf on a P50 basis and by 119% to 1,061bcf on a P10 basis. Surprisingly, contingent resources were downgraded to 204bcf; however, this also took into account three fewer wells in the P50 development plan. Adjusting for this shows a 33% rise in contingent resources on a per well basis, and this more positive interpretation is supported by the 68% rise

in the P10 upside to 570bcf. Significantly, despite this increase there could be further upside once lateral extensions are better understood through delineation drilling and the production potential of horizontal wells with multiple fracs is tested, although areas of exceptionally low permeability and reservoir segmentation provide some downside risks.

#### EXHIBIT 5: SIEKIERKI FIELD

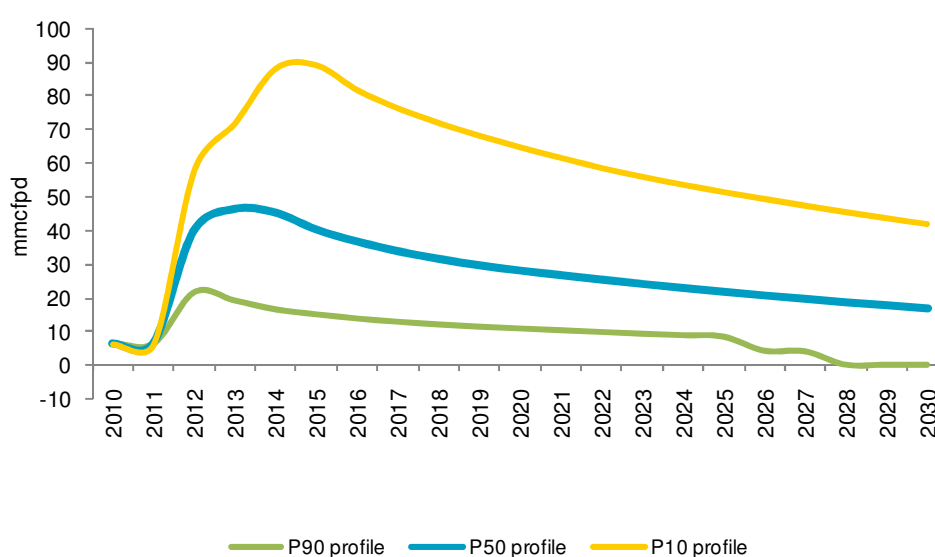
	P90	P50	P10
<b>Gas in place</b>			
2008 CPR (RPS Energy)	261	364	485
Current (Aurelian)	163	513	1061
<b>Contingent resources</b>			
2008 CPR (RPS Energy)	117	211	340
Current (Aurelian)	58	204	570
<b>Recovery factor</b>			
2008 CPR (RPS Energy)	45%	58%	70%
Current (Aurelian)	36%	40%	54%
<b>Number of development wells</b>			
2008 CPR (RPS Energy)	8	11	12
Current (Aurelian)	4	8	14
<b>Contingent resources per well</b>			
2008 CPR (RPS Energy)	15	19	28
Current (Aurelian)	15	26	41

Source: Aurelian, Jefferies International Ltd.

To narrow the contingent resource range and enable full development sanction, Aurelian plans to drill two horizontal wells into different structural segments in 2010. If results from the first well (due to be drilled in Q1) meet expectations, long-term test facilities will be constructed and a second well drilled with production from both sold into the local low pressure network. Gas sales are likely to commence in H2 2010; however, as the production potential of the two wells is unknown, gas will at first need to be sold on an unguaranteed basis, which usually achieves below market prices. Prices should improve as volumes stabilise and Aurelian expects gas sales to average 5.5mmcfpd, although variability in local demand could result in large swings in sales.

Assuming results meet expectations, full field development is scheduled to commence in 2011 with two to three horizontal wells drilled per annum until 2014. In the P50 scenario, eight horizontal wells are needed to establish peak production of 55mmcfpd with gas processed and distributed via the national grid. The chart below shows our production forecasts for the P90, P50 and P10 scenarios based on the number of wells planned by Aurelian.

#### EXHIBIT 6: SIEKIERKI PRODUCTION PROFILE



Source: Jefferies International Ltd.

Under EU laws the Polish gas market has been deregulated, allowing Aurelian to freely market gas production; however, due to POGC's monopoly position tariffs apply to the wholesale and residential gas markets. While these are regularly reviewed, prices are generally set at below-free-market levels, although with two thirds of the market supplied by imported Russian gas there is a link to international oil prices. This structure means Aurelian can either provide part of this subsidy by selling its gas to POGC for a big discount to the reference price or it can undercut POGC by selling directly to industrial customers at a smaller discount.

We estimate that Aurelian will achieve \$6/mcf, and this is supported by the \$5.92/mcf achieved by FX Energy (FXEN, \$4.5, NC) in 2008 even though it sold directly to POGC. Based on these assumptions we estimate that the project will breakeven in 2012 and reach payback in 2015, generating a 21% IRR (33% net IRR after adjusting for cost carry). Importantly, given the attractive fiscal terms (1% royalty and 19% corporate tax) the NPV of the project is highly sensitive to gas prices, which could offer considerable valuation upside if prices converge at European levels. Under this scenario our unrisks NAV for the Siekierki development rises by 52% to \$146m or to 40.3p/sh.

#### EXHIBIT 7: NAV (\$M) SENSITIVITY TO GAS PRICES AND DISCOUNT RATES

	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0
8%	52.0	69.0	86.0	103.0	120.0	137.0	154.0	171.0	188.0
9%	44.0	59.8	75.6	91.4	107.2	123.0	138.8	154.6	170.4
10%	36.9	51.6	66.4	81.1	95.8	110.5	125.2	139.9	154.6
11%	30.6	44.4	58.1	71.8	85.6	99.3	113.1	126.8	140.5
12%	25.0	37.9	50.7	63.6	76.4	89.3	102.1	115.0	127.8
13%	20.0	32.1	44.1	56.2	68.2	80.3	92.3	104.4	116.4
14%	15.6	26.9	38.2	49.6	60.9	72.2	83.5	94.8	106.1
15%	11.6	22.3	32.9	43.6	54.2	64.9	75.5	86.1	96.8

Source: Jefferies International Ltd.

Given the attractive returns highlighted above it is perhaps surprising that financing the development remains one of the key outstanding issues. Aurelian's current plan is to farm-out 40% of the working interest in return for being carried through the majority of the capex for the long-term test. In November 2008 an agreement was in place for Canamens to provide this funding (80% of Aurelian's 90% share of capex limited to €40m); however, due to the credit crunch, a strategic review of its priorities led them to pull out of the project. We understand negotiations are progressing with a number of interested parties and a new partner is expected to be announced before the end of the summer on similar terms. Any delay beyond Q4 is likely to push back first production and could lead Aurelian to consider alternative funding solutions.

Assuming the long-term test is successful and full development is sanctioned, Aurelian will need to fund its share of ongoing capex which is likely to be around \$100m based on a 50% working interest. Clearly this will require external sources including debt and equity but could also include a further farm-out.

#### Poland/Slovakia exploration

Aurelian has established a number of prospective licences on both sides of the Polish Slovakian border that offer material long-term exploration potential close to the North Carpathian Fold Belt. The area has been the source of a large number of oil and gas discoveries during the past 150 years but despite the long history, exploration of deeper horizons has been limited with most discoveries made in shallow horizons. Combined with the lack of comprehensive seismic coverage (only six lines exist on the Bieszczady blocks) Aurelian believes the area remains under-explored.

During 2009 a new 2D seismic survey will be acquired on the Bieszczady blocks to help define drillable structures, and initial results are reportedly very promising. Drilling is expected to commence in 2010 and POGC, operator of the licence, believes there is 300mmboe potential in the area. Further south Aurelian has a 50% working interest in three contiguous licences. These are located in Slovakia and benefit from more attractive fiscal terms (15% income tax and no royalty), although given the greater distance from the North Carpathian Fold Belt are likely to be less prospective. That said, a number of surface oil seeps, gas shows and analogous structures have been identified which support further exploration activity, and a second seismic programme is planned for 2010 to de-risk prospects prior to possible drilling.

On trend to the west Aurelian has been awarded a 100% interest in the Karpaty West blocks. The area is under explored but discoveries to the east and west indicate significant gas potential. We expect Aurelian to farm-out a substantial portion of this acreage ahead of any work programme.

## EXHIBIT 8: NORTH CARPATHIAN FOLD BELT



Source: Aurelian

## Romania

### Production

Aurelian's activities in Romania are located in the north east of the country where it holds four licences. Since 2006 a number of small gas discoveries have been developed on the Brodina licence (62.5% WI) and production from five wells currently averages 3.5mmcfpd. Gas is processed at its Bilca facilities (Aurelian 60%, Romgaz 40%) and is sold at a small discount to the Romanian reference price (\$4-5/mcf).

The Bilca processing facilities were funded by a \$4m mezzanine loan from Gemini and repayment is linked to gross revenues generated by production from relevant assets within the Brodina production area. Under these terms Aurelian pays 50%–55% of its revenue share (based on its original 28.75% working interest and not the 33.75% interest subsequently acquired) to Gemini until \$10m (\$4m loan plus 250% premium) is repaid. Based on its current assumptions Aurelian estimates that its existing proven reserves will be insufficient to repay the full amount with the remaining balance paid from revenues generated by any future discoveries on the Brodina licence.

### Exploration

Historically Aurelian has targeted small shallow gas potential on its Brodina licence and has had reasonable success with four discoveries. In 2007 exploration efforts shifted to the Suceava (50% WI) and Cujeidui (45% WI) licences and discoveries were made on both. The Boistea-1 and Dornesti-1 discoveries are similar in scale to the discoveries on the Brodina licence and due to the small reserves (1bcf each), location and low flow rates (1mmcfpd per well) are likely to be developed as small power generation projects. In 2008, three further wells were drilled, resulting in two more small discoveries (Fractauti-2 and Vicsani-1) on the Brodina licence (subsequently tied into the Bilca processing facilities) and a potentially larger discovery on (Lilieci-1) the Bacau licence (41% WI).

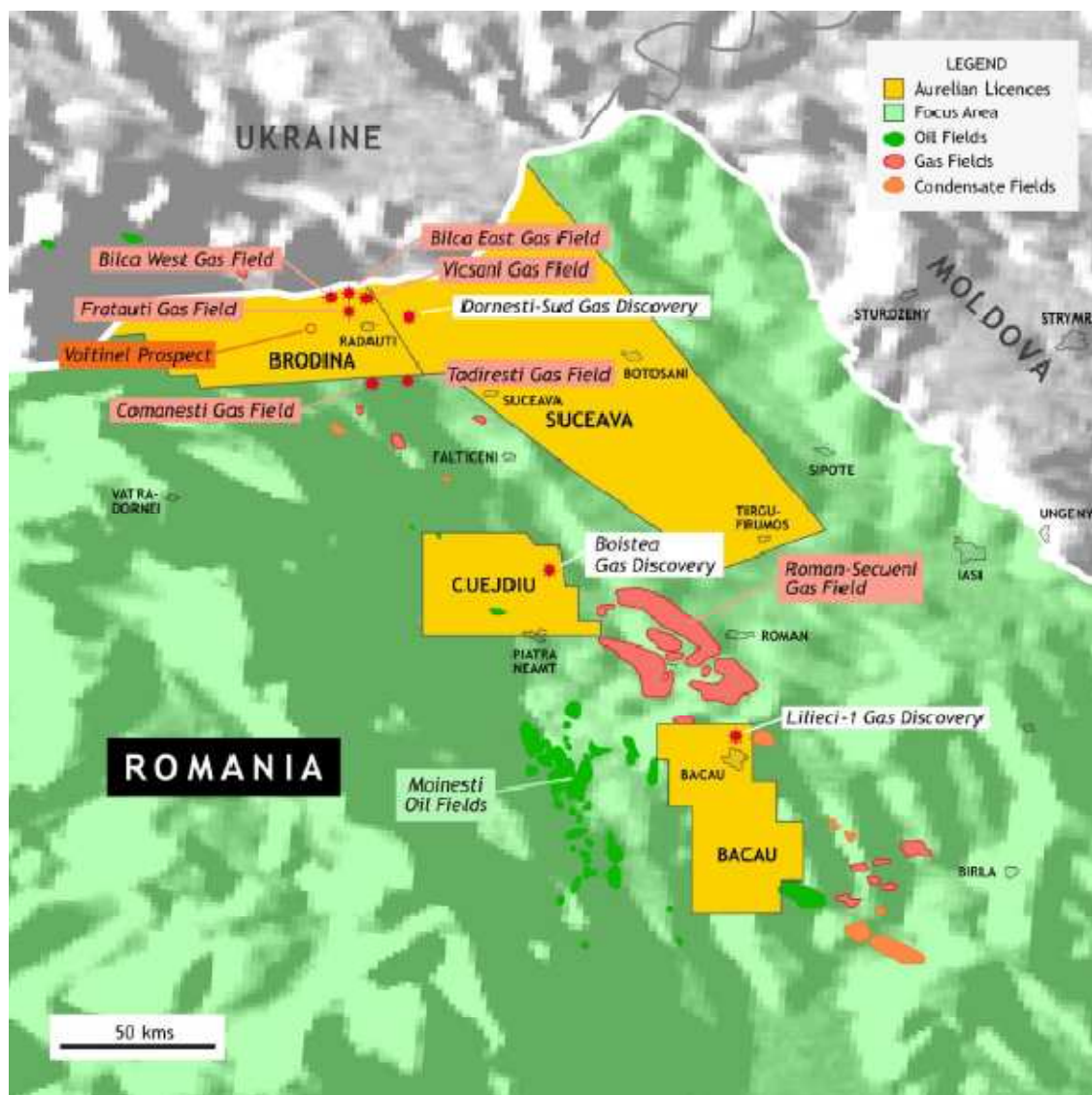
The Lilieci well was drilled to 2,980m and encountered over-pressured gas shows between 1,750m and 2,980m. Two intervals were tested with 10m of reservoir from three zones within the 2,412m and 2,584m interval establishing production of 4.6mmcfpd, while the deeper (2,846–2,915m) interval did not recover commercial volumes of gas. Due to uncertainty over the resource size (3–20bcf) Europa Oil & Gas (EOG LN, 8.75p, NC), which was carried by Aurelian for part of the drilling and testing, has elected not to participate in the appraisal or development phase, increasing Aurelian's working interest in Lilieci to 60%.

Despite this, Aurelian is confident that appraisal work will confirm mean resources at the upper end of this range; however, the timing of a second well depends on the result of the Bogdanesti exploration well currently being drilled by Romgaz on an adjacent licence. The Bogdanesti prospect is a similar structure to Lilieci and if successful would de-risk other prospects (Schineni and Siretu) on trend within the Bacau licence with at least one likely to be

drilled during 2010. By establishing a larger resource base and proving the geological potential of the surrounding area, a processing unit and gas pipeline could be sanctioned.

Elsewhere in Romania there has been a shift in the exploration emphasis with future drilling likely to target deeper and larger sub-thrust structures. The most advanced prospect is on the Brodina licence, where Aurelian has a 33.75% interest in the exploration area. The Voitinel prospect is a large sub-thrust structure with four-way dip closure at depths of 2,000m and is on trend with producing fields across the border in the Ukraine. With a low dry hole cost and 50mmbbl upside potential, the well has company-changing potential, although there is a risk of gas which would be worth significantly less. Drilling is set to commence in late August and take 45 days.

#### EXHIBIT 9: ROMANIA ACREAGE



Source: Aurelian

## Bulgaria – exploration

Aurelian holds a 30% interest in the large B-Golitzia and B1-Golitzia exploration licences following farm-outs to JKK (2005) and Sorgenia (2009). The Sorgenia farm-out was completed in April and includes a carry of \$2.4m towards the cost of a 3D seismic survey and up to \$0.675m for the cost of the first two exploration wells. The 3D seismic data was acquired in late 2008 and is currently being processed with the aim of identifying prospects ahead of a two-well exploration programme commencing in 2010.

Following the Golitzia dry hole drilled in 2007 the emphasis has shifted to smaller, lower-risk prospects on the eastern area of its acreage. During the 1950s and 1960s a number of small gas discoveries were made in this area, proving a working hydrocarbon system and significantly lowering the exploration risk. Several leads in shallow Tertiary aged sands have been identified from 2D seismic data that could hold 50bcf of prospective resources.

## Valuation

Our total NAV for Aurelian is 31.8p/sh and is made up of a core NAV of 24.0p/sh and risked NAV of 7.7p/sh. Within core NAV the majority of the value relates to the Siekierki development (19.8p/sh), while smaller values apply to the Bilca production area in Romania (0.6p/sh) and net cash adjusted for working capital (3.5p/sh). On our estimates the Siekierki development alone is worth significantly more than the current share price assuming a farm-out agreement is reached on similar terms to that of Canamens deal; fully de-risking (from 75%) increases this upside to 127%.

While the Siekierki development is the single most important asset, Aurelian remains an exploration-focused company and as such it has established a large acreage position in central Europe. Generally we do not include acreage within our NAV; however, we do recognise these holdings (such as its licences targeting the North Carpathian Fold Belt) are key components of Aurelian's growth strategy and will mature as initial exploration work is completed. Where prospects have been identified, drilling programmes planned or discoveries made we include a risked value demonstrating the nearer-term upside potential.

Most of this value is in Aurelian's Romanian acreage, which is worth 6.9p/sh, and includes the Lilieci discovery and three undrilled prospects. The largest of these is the 50mmbbl Voitinel prospect which is due to be drilled later this year and has an upside of 79.1p/sh. The remaining value within risked NAV is for a two-well exploration programme planned for Bulgaria in 2010. With no firm targets identified we conservatively estimate each prospect at 25bcf and apply a risk factor of 10%. In aggregate these are worth 0.8p/sh and have an 8.0p/sh upside fully de-risked.

### EXHIBIT 10: NET ASSET VALUE

Field/prospect	Country		Gross unrisks reserves (mmboe)	Equity (%)	Net unrisks reserves (mmboe)	Risk factor (%)	Net risked reserves (mmboe)	NPV (US\$/boe)	Riskd NPV (US\$m)	Riskd NPV (p/sh)	Unrisks NPV (p/sh)
Bilca	Romania	Production	1.1	62.5%	0.7	100%	0.7	4.0	2.3	0.6	0.6
<b>Core producing NAV</b>		<b>Production</b>	<b>1.1</b>	<b>62.5%</b>	<b>0.7</b>	<b>100%</b>	<b>0.7</b>	<b>3.5</b>	<b>2.3</b>	<b>0.6</b>	<b>0.6</b>
Siekierki	Poland	Development	40.1	50.0%	20.1	75%	15.1	4.8	71.8	19.8	26.4
<b>Core development NAV</b>		<b>Development</b>	<b>40.1</b>	<b>50.0%</b>	<b>20.1</b>	<b>75%</b>	<b>15.1</b>	<b>4.8</b>	<b>71.8</b>	<b>19.8</b>	<b>26.4</b>
Net debt									11.7	3.2	3.2
Working capital									1.1	0.3	0.3
<b>Core NAV</b>			<b>41.2</b>	<b>50.3%</b>	<b>20.7</b>	<b>76%</b>	<b>15.7</b>	<b>5.5</b>	<b>87.0</b>	<b>24.0</b>	<b>30.6</b>
Lilieci	Romania	Appraisal	2.2	60.0%	1.3	50%	0.7	1.9	1.3	0.4	0.7
Schineni	Romania	Exploration	1.7	41.0%	0.7	20%	0.1	1.9	0.3	0.1	0.4
Siretu	Romania	Exploration	1.7	41.0%	0.7	20%	0.1	1.9	0.3	0.1	0.4
Voitinel	Romania	Exploration	50.0	33.8%	16.9	10%	1.7	17.3	23.2	6.4	79.1
Prospect 1	Bulgaria	Exploration	4.3	30.0%	1.3	10%	0.1	11.2	1.5	0.4	4.0
Prospect 2	Bulgaria	Exploration	4.3	30.0%	1.3	10%	0.1	11.2	1.5	0.4	4.0
<b>Riskd NAV</b>			<b>64.3</b>	<b>34.6%</b>	<b>22.2</b>	<b>13%</b>	<b>2.9</b>	<b>9.6</b>	<b>28.0</b>	<b>7.7</b>	<b>88.6</b>
<b>Total NAV</b>			<b>105.5</b>	<b>40.7%</b>	<b>43.0</b>	<b>43%</b>	<b>18.6</b>	<b>6.2</b>	<b>115.0</b>	<b>31.8</b>	<b>119.2</b>

Source: Jefferies International Ltd.

## Financials

## EXHIBIT 11: P&amp;L

€m	2008	2009E	2010E	2011E
<b>Revenue</b>	<b>1.9</b>	<b>2.8</b>	<b>3.3</b>	<b>5.1</b>
Operating costs	-0.9	-1.1	-1.6	-1.9
DD&A	-0.1	-0.2	-0.9	-1.6
Exceptional write-off	-2.9	0.0	0.0	0.0
<b>Cost of sales</b>	<b>-4.1</b>	<b>-1.2</b>	<b>-2.5</b>	<b>-3.5</b>
Administration	-3.9	-2.5	-2.5	-2.5
Exploration write-off	-0.3	0.0	0.0	0.0
Other income	0.0	0.0	0.0	0.0
<b>Operating profit</b>	<b>-6.5</b>	<b>-1.0</b>	<b>-1.6</b>	<b>-0.9</b>
Net interest	0.5	0.2	-0.1	-0.5
FX	1.6	0.0	0.0	0.0
Exceptional non-operating items	0.0	0.0	0.0	0.0
<b>Pre-tax profit</b>	<b>-4.4</b>	<b>-0.7</b>	<b>-1.8</b>	<b>-1.3</b>
Taxation	0.0	0.0	0.0	-0.8
<b>Net income</b>	<b>-4.4</b>	<b>-0.7</b>	<b>-1.8</b>	<b>-2.0</b>
Minorities	0.0	0.0	0.0	0.0
<b>Net attributable income</b>	<b>-4.4</b>	<b>-0.7</b>	<b>-1.8</b>	<b>-2.0</b>
Exceptionals	2.9	0.0	0.0	0.0
<b>Clean net attributable income</b>	<b>-1.5</b>	<b>-0.7</b>	<b>-1.8</b>	<b>-2.0</b>
Shares average	135.4	232.1	232.1	232.1
Shares diluted	147.7	241.4	241.4	241.4
EPS (Normal) - Euro cents	-3.3	-0.3	-0.8	-0.9
EPS (Diluted) - Euro cents	-3.0	-0.3	-0.7	-0.8
EPS (Normal) - GBp	-2.6	-0.3	-0.7	-0.8
EPS (Diluted) - GBp	-2.4	-0.3	-0.7	-0.8
Clean EPS (Normal) - GBp	-0.9	-0.3	-0.7	-0.8
Clean EPS (Diluted) - GBp	-0.8	-0.3	-0.7	-0.8
DPS	0.0	0.0	0.0	0.0

Source: Jefferies International Ltd.

## EXHIBIT 12: BALANCE SHEET

€m	2008	2009E	2010E	2011E
<b>Total current assets</b>	<b>13.3</b>	<b>19.7</b>	<b>8.2</b>	<b>-4.7</b>
Cash	6.0	13.6	2.1	-10.1
Accounts receivable	7.3	6.0	6.0	5.1
Inventory	0.0	0.1	0.2	0.3
<b>Total fixed assets</b>	<b>40.0</b>	<b>44.9</b>	<b>54.0</b>	<b>60.7</b>
Tangible fixed assets	5.5	5.3	10.8	17.5
Intangible fixed assets	34.6	39.6	43.2	43.2
Investments	0.0	0.0	0.0	0.0
<b>Total assets</b>	<b>53.3</b>	<b>64.6</b>	<b>62.2</b>	<b>56.0</b>
<b>Total current liabilities</b>	<b>4.8</b>	<b>5.0</b>	<b>5.0</b>	<b>1.3</b>
Trade creditors	4.8	5.0	5.0	1.3
Other	0.0	0.0	0.0	0.0
<b>Long term liabilities</b>	<b>2.6</b>	<b>1.9</b>	<b>1.3</b>	<b>0.8</b>
Debt	2.6	1.9	1.3	0.8
Other	0.0	0.0	0.0	0.0
<b>Total liabilities</b>	<b>7.4</b>	<b>6.9</b>	<b>6.3</b>	<b>2.1</b>
<b>Net assets</b>	<b>46.0</b>	<b>57.7</b>	<b>55.9</b>	<b>53.9</b>
<b>Equity</b>	<b>0.0</b>	<b>0.0</b>	<b>0.0</b>	<b>0.0</b>
Shareholders equity	46.0	57.7	55.9	53.9
Minority interest	0.0	0.0	0.0	0.0
<b>Total</b>	<b>46.0</b>	<b>57.7</b>	<b>55.9</b>	<b>53.9</b>

Source: Jefferies International Ltd.

## EXHIBIT 13: CASH FLOW STATEMENT

€m	2008	2009E	2010E	2011E
Operating profit	-4.9	-1.0	-1.6	-0.9
DD&A /Exploration WO	4.1	0.2	0.9	1.6
Other	-0.5	0.0	0.0	0.0
<b>Operating Cashflow before interest/tax</b>	<b>-1.3</b>	<b>-0.8</b>	<b>-0.8</b>	<b>0.7</b>
Interest	0.5	0.3	-0.1	-0.4
Tax	-0.1	0.0	0.0	-0.8
<b>Operating Cashflow after interest/tax</b>	<b>-0.9</b>	<b>-0.5</b>	<b>-0.9</b>	<b>-0.4</b>
Dividends	0.0	0.0	0.0	0.0
Chg. Working Cap	-3.5	1.3	0.0	-2.9
Capex	-18.4	-5.0	-10.0	-8.3
Asset purchases (sales)	0.0	0.0	0.0	0.0
<b>Free Cashflow before financing</b>	<b>-22.8</b>	<b>-4.2</b>	<b>-10.9</b>	<b>-11.7</b>
Equity issue:	0.1	12.5	0.0	0.0
Change in Debt	-0.3	-0.7	-0.6	-0.5
Other	0.0	0.0	0.0	0.0
<b>Free Cashflow after financing</b>	<b>-22.9</b>	<b>7.6</b>	<b>-11.5</b>	<b>-12.1</b>
Currency translation	-0.4	0.0	0.0	0.0
Change in cash	-23.3	7.6	-11.5	-12.1

Source: Jefferies International Ltd.

## EXHIBIT 14: MACRO FORECASTS

	Unit	2008	2009E	2010E	2011E
Brent	US\$/bbl	98.3	60.0	80.0	80.0
UK gas	GBP/therm	61.9	50.0	50.0	50.0
US\$/GBP	x	1.85	1.50	1.50	1.50

Source: Jefferies International Ltd.

## Management

### *Michael Seymour (President)*

Mr Seymour is a trained geologist with more than 40 years' experience in the oil industry. During his career, Michael has founded a number of oil companies including Aurelian, which he established in 2002 as part of a deal that saw him leave Ramco (where he was exploration director) and acquire assets located in Poland, Romania and Bulgaria. These assets now make up a significant proportion of Aurelian's current licence portfolio. In July 2009 Michael became President.

### *Rowen Bainbridge (CEO)*

Mr Bainbridge joined Aurelian in July 2009 as the new CEO and has 22 years of experience leading, delivering and executing projects in the energy sector. Rowen commenced his career at ICI and has held a number of finance and risk management roles at RWE, Centrica and Fletcher Challenge. In 2000 he joined BHP Billiton where he was Vice President of Market Development with a particular focus on the upstream gas sectors in the FSU and Algeria. More recently Rowen was appointed head of the energy division at Ferrexpo with a brief to turn around its Ukrainian oil and gas portfolio. This led to the creation of Ferrexpo Petroleum where he was CEO.

### *Frank Jackson (Commercial Director)*

On its formation Mr Jackson joined Aurelian initially as a non-executive director but in 2005 assumed executive responsibilities. He has more than 30 years' experience in funding and development projects in the natural resources sector and has previously worked in Africa for Rio Tinto and Anglo American. Frank has been involved in oil, mining and water businesses in Eastern Europe since 1982 and was a founding member of the British Chamber of Commerce in Poland.

### *Roy Hartley (Operations Director)*

Mr Hartley joined Aurelian in 2006 as a non-executive director and became operations director later in the same year. Roy is a chartered petroleum engineer and has worked in the oil industry for more than 30 years, holding operations and R&D positions with Shell. More recently he has worked as a consultant specialising in reserves evaluation, mature field development and production technology problems before moving to Helix-RDS, where he worked closely with Aurelian on its developments in Romania and Poland.

## Shareholders

### EXHIBIT 15: SHAREHOLDERS

Investor	m shares	%
John Sainsbury	44.0	18.9%
Palo Alto Investors	27.8	12.0%
Kulczyk Holding	17.9	7.7%
Blue Ridge Capital	13.0	5.6%
Integrated Core Strategies	12.5	5.4%
Millenium Management	12.5	5.4%
Contessa Properties	11.0	4.8%
BlackRock Investment Manage	8.2	3.5%
Michael Seymour	7.4	3.2%
Ingalls & Snyder	5.6	2.4%
Other	72.4	31.1%
<b>Total</b>	<b>232.4</b>	<b>100%</b>

Source: Thomson One

## Financing

### EXHIBIT 16: MAJOR EQUITY ISSUANCE

Date	Event	Equity capital raised
March 2006	Private placing	£26m
August 2006	IPO	£12.6m
May 2009	Share placing	£11.6m

Source: Aurelian

## Company Description

Aurelian is an exploration and production company focusing on eastern European countries, including Romania, Slovakia, Bulgaria and Poland. It has production activities in Romania and a major undeveloped field in Poland. The company has an experienced management team and aims to deliver significant growth through the application of modern exploration techniques.

## ANALYST CERTIFICATIONS

I, William Arnstein, certify that all of the views expressed in this research report accurately reflect my personal views about the subject security(ies) and subject company(ies). I also certify that no part of my compensation was, is, or will be, directly or indirectly, related to the specific recommendations or views expressed in this research report.

As is the case with all Jefferies International Ltd. employees, the analyst(s) responsible for the coverage of the financial instruments discussed in this report receive compensation based in part on the overall performance of the firm, including investment banking income. We seek to update our research as appropriate, but various regulations may prevent us from doing so. Aside from certain industry reports published on a periodic basis, the large majority of reports are published at irregular intervals as appropriate in the analyst's judgement.

Jefferies International Limited is acting as Joint Broker to Aurelian Oil & Gas PLC. Jefferies makes a market in Aurelian Oil & Gas PLC.

Jefferies International Limited acts as Nominated Adviser and Joint Corporate Broker to Afren Plc. Jefferies makes a market in Afren Plc. In April 2009, Jefferies acted as Co-Lead Manager for Afren Plc's GBP84.8m placing.

Within the past twelve months, Jefferies received compensation from Dana Petroleum Plc. Jefferies makes a market in the company.

Jefferies is NOMAD and Joint Broker. Jefferies makes a market in Northern Petroleum Plc.

Will Arnstein owns shares of Premier Oil common stock.

At this time, Jefferies expects to receive or intends to seek paid investment banking assignments from Aurelian Oil and Gas within the next three months.

For Important Disclosure information on companies recommended in this report, please visit our website at <https://jefferies.bluematrix.com/bluematrix/JefDisclosure> or call 212.284.2300.

## Meanings of Jefferies International Ltd. Ratings

**Buy** - Describes stocks that we expect to provide a total return (price appreciation plus yield) of 15% or more within a 12-month period.

**Hold** - Describes stocks that we expect to provide a total return (price appreciation plus yield) of plus 15% or minus 10% within a 12-month period.

**Underperform** - Describes stocks that we expect to provide a total negative return (price appreciation plus yield) of 10% or more within a 12-month period.

Our focus on mid-capitalization and growth companies implies that many of the companies we cover are typically more volatile than the overall stock market, which can be amplified for companies with an average stock price consistently below \$10. For companies in this category only, the expected total return (price appreciation plus yield) for Buy rated stocks is 20% or more within a 12-month period. For Hold rated stocks with an average stock price consistently below \$10, the expected total return (price appreciation plus yield) is plus or minus 20% within a 12-month period. For Underperform rated stocks with an average stock price consistently below \$10, the expected total return (price appreciation plus yield) is minus 20% within a 12-month period.

**NR** - The investment rating and price target have been temporarily suspended. Such suspensions are in compliance with applicable regulations and/or Jefferies International Ltd. policies.

**CS** - Coverage Suspended. Jefferies International Ltd. has suspended coverage of this company.

**NC** - Not covered. Jefferies International Ltd. does not cover this company.

**Restricted** - Describes issuers where, in conjunction with Jefferies International Ltd. engagement in certain transactions, company policy or applicable securities regulations prohibit certain types of communications, including investment recommendations.

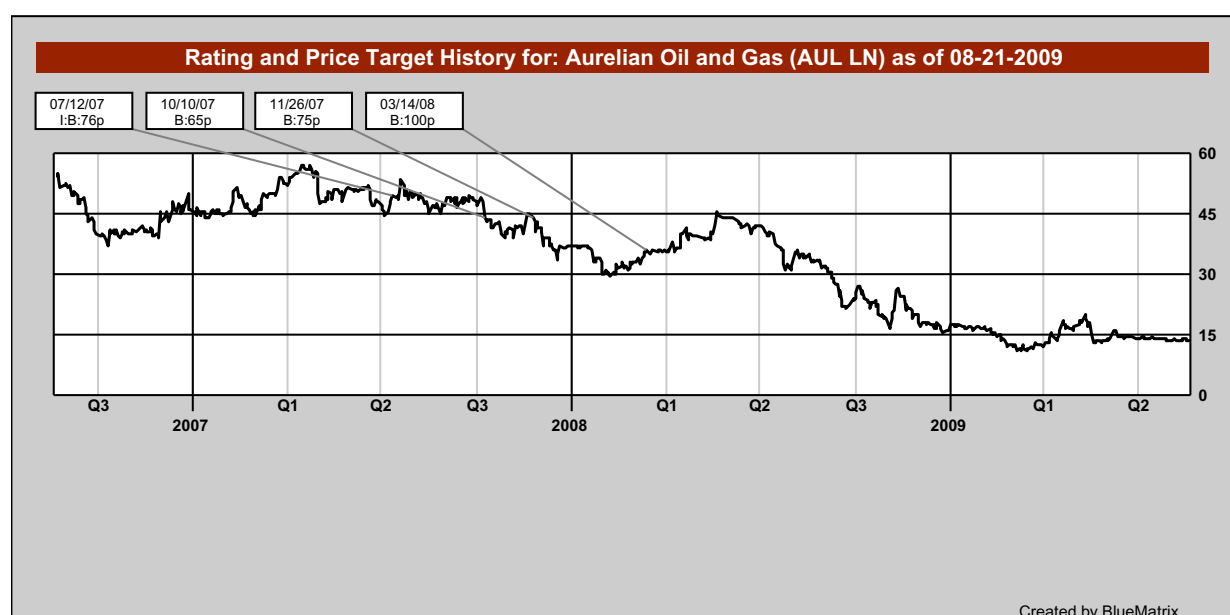
**Monitor** - Describes stocks whose company fundamentals and financials are being monitored, and for which no financial projections or opinions on the investment merits of the company are provided.

## Valuation Methodology

Jefferies International Ltd. methodology for assigning ratings may include the following: market capitalization, maturity, growth/value, volatility and expected total return over the next 12 months. The price targets are based on several methodologies, which may include, but are not restricted to, analyses of market risk, growth rate, revenue stream, discounted cash flow (DCF), EBITDA, EPS, cash flow (CF), free cash flow (FCF), EV/EBITDA, P/E, PE/growth, P/CF, P/FCF, premium (discount)/average group EV/EBITDA, premium (discount)/average group P/E, sum of the parts, net asset value, dividend returns, and return on equity (ROE) over the next 12 months.

## Risk which may impede the achievement of our Price Target

This report was prepared for general circulation and does not provide investment recommendations specific to individual investors. As such, the financial instruments discussed in this report may not be suitable for all investors and investors must make their own investment decisions based upon their specific investment objectives and financial situation utilizing their own financial advisors as they deem necessary. Past performance of the financial instruments recommended in this report should not be taken as an indication or guarantee of future results. The price, value of, and income from, any of the financial instruments mentioned in this report can rise as well as fall and may be affected by changes in economic, financial and political factors. If a financial instrument is denominated in a currency other than the investor's home currency, a change in exchange rates may adversely affect the price of, value of, or income derived from the financial instrument described in this report. In addition, investors in securities such as ADRs, whose values are affected by the currency of the underlying security, effectively assume currency risk.



## Distribution of Ratings

Rating	Count	Percent	IB Serv./Past 12 Mos.	
			Count	Percent
BUY [BUY/ SB]	409	50.40	47	11.49
HOLD [HOLD]	325	40.00	18	5.54
SELL [SU/ UNPF]	78	9.60	5	6.41

This material has been issued and approved by Jefferies International Limited ("JIL"), a dealer authorized and regulated in the United Kingdom ("UK") by the Financial Services Authority ("FSA"). Unless prohibited by the provisions of Regulation S of the U.S. Securities Act of 1933, this material will be distributed in the United States ("US"), by Jefferies & Company, Inc. ("JEFCO"), 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. Transactions by or on behalf of any US person may only be effected through JEFCO.

In the UK, this material is intended for use only by persons who have professional experience in matters relating to investments falling within Articles 19(5) and 49(2)(a) to (d) of the Financial Services and Markets Act 2000 (Financial Promotion) Order 2005 (as amended), or by persons to whom it can be otherwise lawfully distributed. For Canadian investors, this material is intended for use only by professional or institutional investors. None of the

investments or investment services mentioned or described herein is available to other persons or to anyone in Canada who is not a "Designated Institution" as defined by the Securities Act (Ontario). For investors in the Republic of Singapore, this material is provided by Jefferies International Limited through Jefferies Singapore Limited ("JSL") pursuant to Regulation 32C of the Financial Advisers Regulations. The material contained in this document is intended solely for accredited, expert or institutional investors, as defined under the Securities and Futures Act (Cap. 289 of Singapore). If there are any matters arising from, or in connection with this material, please contact JSL in Singapore at 80 Raffles Place #15-20, UOB Plaza 2, Singapore 048624, telephone: +65 6551 3950.

The information set forth herein was obtained from sources believed to be reliable, but has not been independently verified by JIL, JSL or JEFCO. Therefore, except for any obligation under the rules of the FSA we do not guarantee its accuracy. Additional and supporting information is available upon request. This is not an offer or solicitation of an offer to buy or sell any security or derivative instrument, or to make any investment. Any opinion or estimate constitutes the preparer's best judgment as of the date of preparation, and is subject to change without notice. JIL, JSL, JEFCO, their associates or affiliates, and their respective officers, directors, and employees may have long or short positions in, or may buy or sell any of the securities, derivative instruments or other investments mentioned or described herein, either as agent or as principal for their own account.

This material does not constitute a personal recommendation or take into account the particular investment objectives, financial situations, or needs of individual clients. 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 price and value of the investments referred to herein and the income from them may fluctuate. Past performance is not a guide to future performance, future returns are not guaranteed, and a loss of original capital may occur. Fluctuations in exchange rates could have adverse effects on the value or price of, or income derived from, certain investments.

JIL research reports are disseminated and available primarily electronically, and, in some cases, in printed form. Electronic research is simultaneously available to all clients. This report or any portion hereof may not be reprinted, sold or redistributed without the written consent of JIL. JIL has adopted a conflicts management policy in connection with the preparation and publication of research, the details of which are available upon request in writing to: The Compliance Officer, Jefferies International Limited, Vintners Place, 68 Upper Thames Street, London EC4V 3BJ; telephone +44 (0) 20 7029 8000; facsimile +44 (0) 20 7029 8010.

Upon request Jefferies International Limited may provide specialized research products or services to certain customers focusing on the prospects for individual covered stocks as compared to other covered stocks over varying time horizons or under differing market conditions. While the views expressed in these situations may not always be directionally consistent with the long-term views expressed in the analyst's published research, the analyst has a reasonable basis and any inconsistencies can be reasonably explained.

**© 2009 Jefferies International Ltd.**