

IRONBARK ZINC LTD (IBG)

Upside is still enormous if zinc prices keep going up

Zinc prices have had a significant rally in the past few months, and many sell-side commodity analysts expect the rally to continue.

Ironbark Zinc Limited is developing the very large Citronen zinc project in Greenland. Due to the scale of the project (large production and long mine life), the upside leverage to zinc prices is very significant. We estimate every 1 cent that zinc rises above US\$1/lb adds 0.7-1.5cps to our valuation.

Our base case valuation (NPV₁₂) of IBG is \$0.27. The Company is engaged with China Non-Ferrous Corp (NFC) for potential financing. The MOU encompasses a 70% debt funding proposal brokered through Chinese banks and provides NFC with a right to buy a 19.9% direct interest at the project level. However, our base valuation assumes a traditional financing agreement (ie no project divestment to NFC), and hence we assume equity dilution. Our base case dilution is significant because we also assume equity is raised at low prices (~19cps). More likely though, it is possible that equity could be raised at significantly higher levels should the share price factor in high zinc prices ahead of such a raising. Fig 1 presents this case.

The table shows our base case valuation (assuming large dilution) and two more optimistic scenarios. Our "Lower Bull Case" valuation assumes the project is funded 100% equity, but at prices closer to the full project value. Our "Maximum Bull Case" valuation assumes the project is funded entirely with debt (or funded with internal cash flow from a larger company).

Upcoming news flow...

- September Qtr 2014: Lodging of mining licence application;
- Dec Qtr 2014 or March Qtr 2015: Granting of mining licence;
- March or June Qtrs 2015: Financing negotiations completed;
- June Qtr 2015: Some early site works could begin;

Retain Speculative Buy recommendation.

Despite a decent rally in the share price, there remains significant upside if zinc prices rise in line with the upper end of expectations, in our view. We maintain our Speculative Buy recommendation.

Fig. 1: IBG leverage to long term zinc prices

Zinc Price			Base Case			Lower B	ull Case	Maximum Bull Case			
per lb		(aggressive dilution)			(:	(100% equity funded)			(100% debt funded)		
		IB	G Val.	New Shares	IB	G Val.	New Shares	IB	G Val.	New Shares	
AUD*	USD	(A	\$/shr)	(m)	(A:	\$/shr)	(m)	(A	\$/shr)	(m)	
0.65	0.60			n/a			n/a			0	
0.76	0.70			n/a			n/a			0	
0.86	0.80			n/a			n/a			0	
0.97	0.90			n/a			n/a			0	
1.08	1.00	\$	0.03	5415	\$	0.01	32126	\$	0.25	0	
1.19	1.10	\$	0.19	964	\$	0.18	2456	\$	0.50	0	
1.30	1.20	\$	0.28	790	\$	0.38	1293	\$	0.75	0	
1.40	1.30	\$	0.35	728	\$	0.58	879	\$	1.00	0	
1.51	1.40	\$	0.43	696	\$	0.79	667	\$	1.25	0	
1.62	1.50	\$	0.50	676	\$	1.01	537	\$	1.50	0	
1.73	1.60	\$	0.57	663	\$	1.24	450	\$	1.75	0	
1.84	1.70	\$	0.64	654	\$	1.47	387	\$	2.00	0	
1.94	1.80	\$	0.71	647	\$	1.70	339	\$	2.25	0	
2.05	1.90	\$	0.78	641	\$	1.93	302	\$	2.50	0	
2.16	2.00	\$	0.85	637	\$	2.17	272	\$	2.74	0	
AUD/USD* 0.93					•			•			

Source: Hartleys. Valuations based on a 12% discount rate.

Speculative Buy

	9 Sep 2014
Share Price	\$0.150
Valuation	\$0.27
Price Target (12 month)	\$0.34

Brief Business Description:

Very large zinc development project in Greenland

Hartleys Brief Investment Conclusion

Deposit is large and implies long mine life. Marginally economic on consensus estimated zinc prices, very economic at industry (the upper end of sell-side consensus) forecasted prices

Chairman & MD

Peter Bennetto (Non Executive Chairman)

Jonathan Downes (Managing Director)

Major Shareholders

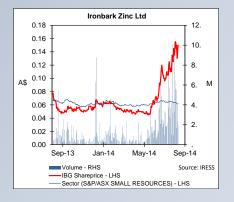
Nyrstar Int	22.1%
Glencore Xstrata	9.5%
L1 Capital	7.6%
Company Address	
evel 1, 350 Hay St	

Subiaco, WA, 6008

Issued Capital	441.6m
- fully diluted (no conv. Notes)	447.6m
Market Cap	A\$66.2m
- fully diluted	A\$67.1m
Cash (30 Sep 14e)#	A\$3.7m
Cash (30 Sep 14e) notes drawn	A\$53.7m
Debt (30 Sep 14e)#	A\$0.0m
EV	A\$62.5m
EV/Resource Zn	A\$0.0053/lb
FV/Reserve 7n	

Prelim. (A\$m)	FY15e	FY16e	FY17e
Prod (kt Zn eq)	0.0	0.0	84.4
Op Cash Flw	-2.2	-14.2	36.7
Norm NPAT	-2.2	-31.6	32.1
CF/Share (cps)	-0.5	-3.4	2.2
EPS (cps)	-0.6	-3.7	2.4
P/E	-28.6	-4.4	6.7
		Zn	Pb
Resources (Billion Ib)		11.9	1.2

Reserves (Billion Ib) # we assume convertible notes are never drawn



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Hartleys has completed a capital raising in the past 12 months for Ironbark Zinc Limited ("Ironbark"), for which it has earned fees. Hartleys has provided corporate advice within the past 12 months and continues to provide corporate advice to Ironbark, for which it has earned fees and continues to earn fees. Analyst has a beneficial interest in IBG. See back page for details

lronbark Zinc Ltd IBG	•			Sh	are Price \$0.150						Septemb Speculat	
Key Market Information						Directors				C	ompany In	form <u>ati</u>
Share Price					\$0.150	Peter Bennetto (Non Executive Chairman)					Level 1, 3	
Market Capitalisation - ordin	nary but a	ssumes notes a	are converted		A\$83m	Jonathan Downes (Managing Director)					Subiaco,	WA, 60
Net Debt (cash), ex undraw	n US\$50r	n notes			-\$4m	Adrian Byass (Executive Technical Directo)				Ph +61 8	6461 63
Market Capitalisation - fully	diluted				A\$67m	Gregory Campbell (Executive Engineering	Director)				Fax +61 8	6210 18
EV					A\$62m	David Kelly (Non Exec, Glencore represent	ative)					
ssued Capital					441.6m	Chris James (Non Exec, Nyrstat representa	ative)			www.iror	nbarkgold	l.com.a
						John McConnell (Non Exec.)						
Options					6.0	Gary Comb (Non Exec.)						
ssued Capital (diluted for o			otes)		447.6m	Top Shareholders		Ordinary		Di	luted Notes	
ssued Capital (diluted inc.	options ar	nd new capital)			1403.3m			m sh.	%		m sh.	%
12month price target					\$0.34	Nyrstar Int Glencore Xstrata		97.7 42.0	22.1% 9.5%		97.7 153.4	17.7% 27.7%
2&L	Unit	30 Jun 15	30 Jun 16	30 Jun 17	30 Jun 18	L1 Capital Reserves & Resources	_	33.7 Mt	7.6% Zn %	Pb %	33.7	6.1%
Net Revenue	A\$m	0.0	0.0	239.5	557.4	Citronen - High Grade M+I		52	5.3%	0.5%		
Total Costs	A\$m	-2.1	-2.2	-150.0	-303.2	Citronen - High Grade Inf		19	4.7%	0.4%		
EBITDA	A\$m	-2.1	-2.2	89.5	254.2	Citronen - High Grade Total		71	5.1%	0.5%		
- margin			-	37%	46%	Citronen - High Grade Reserve		-	,,			
Depreciation/Amort	A\$m	0.0	-17.5	-33.7	-41.8	Citronen - Global M+I		94	4.2%	0.4%		
BIT	A\$m	-2.2	-19.7	55.8	212.5	Citronen - Global Inf		38	3.8%	0.4%		
Net Interest	A\$m	-0.1	-11.9	-23.7	-23.0	Citronen - Global Total		132	4.1%	0.4%		
Pre-Tax Profit	A\$m	-2.2	-31.6	32.1	189.5	Citronen - Global Reserve		- "				
Гах Expense	A\$m	0.0	0.0	0.0	-57.4	Production Summary	Unit	Jun 14	Jun 15	Jun 16	Jun 17	Jun
Normalised NPAT	A\$m	-2.2	-31.6	32.1	132.0	Unbeneficiated Mill Throughput	Mt	0.00	0.00	0.00	1.64	3.
Abnormal Items	A\$m	0.0	0.0	0.0	0.0	Processed Mill Throughput	Mt	0.00	0.00	0.00	1.10	2.
Reported Profit	A\$m	-2.2	-31.6	32.1	132.0	Mined grade Zn	%	0.0%	0.0%	0.0%	6.4%	7.4
Minority	A\$m	0.0	0.0	0.0	0.0	Produced Zn	kt	0.0	0.0	0.0	93.9	21
Profit Attrib	A\$m	-2.2	-31.6	32.1	132.0	Payable Zn	kt	0.0	0.0	0.0	79.8	18
						Payable Zn Equiv	kt	0.0	0.0	0.0	84.4	19
Balance Sheet	Unit	30 Jun 15	30 Jun 16	30 Jun 17	30 Jun 18	M&I High Grade Resource Conversion	%	89.3%	89.3%	89.3%	90.6%	89.
Cash	A\$m	-39.1	268.7	259.5	572.1	Mine Life	yr	13.75	13.75	13.75	13.75	12.
Other Current Assets	A\$m	0.2	0.2	29.7	68.9	Assumed Reserve	Mt	46.0	46.0	46.0	45.1	4
Total Current Assets	A\$m	-38.9	268.8	289.2	641.0	Assumed Reserve - Zn grade	%	5.2%	5.2%	5.2%	5.2%	5.
Property, Plant & Equip.	A\$m	42.3	295.7	485.4	443.6	Assumed Reserve - Pb grade	%	0.5%	0.5%	0.5%	0.5%	0.
Exploration	A\$m	91.6	92.0	92.4	92.8	Capex			- 43.2 -	270.9 -	223.4	-
nvestments/other	A\$m	1.2	1.2	1.2	1.2	Costs	Unit	Jun 14	Jun 15	Jun 16	Jun 17	Jun
Tot Non-Curr. Assets	A\$m	135.1	388.9	579.0	537.6	Cost per milled tonne	\$A/t	-	-	-	82.7	83
Total Assets	A\$m	96.1	657.7	868.2	1178.6	EBITDA / tonne milled ore	\$A/t	nm	nm	nm	54.5	77.4
						Total cost per milled tonne	•	**	•		91.4	92
Short Term Borrowings	A\$m	-	_	-	-	Total Cost per fillied to line Total Cash Costs	\$A/lb Zn eq				0.81	0.7
Other	A\$m	0.1	0.1	0.5	0.9	C1: Operating Cash Cost = (a)	\$A/lb Zn eq	nm	nm	nm	0.73	0.6
Total Curr. Liabilities	A\$m	0.1	0.1	0.5	0.9	(a) + Royalty = (b)	\$A/lb Zn eq	nm	nm	nm	0.79	0.
ong Term Borrowings	A\$m	-	415.3	415.3	415.3	C2: (a) + depreciation & amortisation = (c)	\$A/lb Zn eq	-	-	-	0.91	0.7
Other	A\$m	-	-	-	-	(a) + actual cash for development = (d)	\$A/lb Zn eq	-	-	-	1.93	0.6
Total Non-Curr. Liabil.	A\$m	-	415.3	415.3	415.3	C3: (c) + Royalty	\$A/lb Zn eq	-	-	-	0.98	0.8
Total Liabilities	A\$m	0.1	415.3	415.7	416.1	(d) + Royalty	\$A/lb Zn eq	-	-	-	2.00	0.7
Net Assets	A\$m	96.0	242.4	452.5	762.5							
Net Debt	A\$m	39.1	146.6	155.7	-156.8	Price Assumptions AUDUSD	Unit A\$/US\$	Jun 14 0.92	Jun 15 0.91	Jun 16 0.94	Jun 17 0.91	Jun 0.90
Cashflow	Unit	30 Jun 15	30 Jun 16	30 Jun 17	30 Jun 18	Zinc	US\$/lb	0.92	1.01	1.08	1.13	1.16
Operating Cashflow	A\$m	-2.1	-2.2	60.4	215.5	Lead	US\$/lb	0.96	1.01	1.05	1.07	1.09
ncome Tax Paid	A\$m	0.0	0.0	0.0	-57.4	Hedging	Unit	Jun 14	Jun 15	Jun 16	Jun 17	
nterest & Other	A\$m	-0.1	-11.9	-23.7	-23.0	none						
Operating Activities	A\$m	-2.2	-14.2	36.7	135.0	Sensitivity Analysis						
								Valuation			F	Y17 NP
Property, Plant & Equip.	A\$m	-43.2	-270.9	-223.4	0.0	Base Case		0.27				32.1
Exploration and Devel.	A\$m	-0.4	-0.4	-0.4	-0.4	Spot Prices		24 (-11.3%)			16.	4 (-49.0
Other	A\$m	0.0	0.0	0.0	0.0	Spot USD/AUD 0.93, Zinc \$1.08/lb,Lead \$6		00/ /= 5			074/1	
nvestment Activities	A\$m	-43.6	-271.3	-223.8	-0.4	AUDUSD +/10%	0.25 / 0.28 (-5.	,			37.1 (-12.79	
Corrouingo	Λ €		445.0		0.0		.39 / -0.05 (47.8%				13.5 (58.1% 7 31.0 (3.5)	
Borrowings	A\$m A\$m	0.0	415.3 178.0	0.0 178.0	0.0 178.0	Lead +/10%	0.27 / 0.26 (3.0 0.41 / 0.01 (51.89	,				
Equity or "tbc capital" Dividends Paid	A\$m A\$m	2.5				Production +/10% Operating Costs +/10%	0.41 / 0.01 (51.89	,			11.6 (63.9% 45.7 (-42.3°	
Dividends Paid Financing Activities	A\$m A\$m	0.0 2.5	0.0 593.2	0.0 178.0	0.0 178.0	Operating Costs +/10% Unpaid Capital (excluding convertible no			e never use		45.7 (-42.39	70 / 42.3
mancing Activities	Maiil	2.5	393.2	176.0	170.0	Year Expires	nes which are as			Avg price 9	% ord	
Net Cashflow	A\$m	-43.3	307.8	-9.1	312.6	30-Jun-15		No. (m) 0.0	<u>\$m</u> 0.0	0.00	<u>% ога</u> 0%	
340		10.0	551.0	-3.1	0.2.0	30-Jun-16		0.0	0.0	0.00	0%	
Shares	Unit	30 Jun 15	30 Jun 16	30 Jun 17	30 Jun 18	30-Jun-17		1.0	0.0	0.10	0%	
Ordinary Shares - End	m	441.6	1397.3	1487.2	1581.2	30-Jun-18		5.0	1.5	0.30	1%	
Ordinary Shares - W'ted	m	427.6	919.4	1442.2	1534.2	30-Jun-19		0.0	0.0	0.00	0%	
Diluted Shares - W'ted	m	433.6	925.4	1447.7	1536.7	30-Jun-20		0.0	0.0	0.00	0%	
						TOTAL		6.0	1.6	0.27	1%	
tatio Analysis	Unit	30 Jun 15	30 Jun 16	30 Jun 17	30 Jun 18	Valuation				\$m	\$/shr	
ashflow Per Share	A\$ cps	-0.5	-1.5	2.5	8.8	100% Citronen (pre-tax NAV at disc. rate of	12%)			437	0.31	
ashflow Multiple	x	-28.9	-9.7	5.9	1.7	Other Assets/Exploration				30	0.02	
arnings Per Share	A\$ cps	-0.5	-3.4	2.2	8.6	Forwards				0	0.00	
Price to Earnings Ratio	x	-28.6	-4.4	6.7	1.7	Corporate Overheads				-13	-0.01	
Dividends Per Share	AUD	-	-	-	-	Net Cash (Debt)				4	0.00	
Dividend Yield	%	0.0%	0.0%	0.0%	0.0%	Convertible notes (assumed converted to e	quity)			0	0.00	
Net Debt / Net Debt + Equit	ty%	29%	38%	26%	-26%	Tax (NPV future liability)				-84	-0.06	
	X	na	na	2.4	9.2	Options & Other Equity				1	0.00	
nterest Cover	%	na	na	7%	17%	Total				374	0.27	
Return on Equity						· · · · · · · · · · · · · · · · · · ·					_	_
Return on Equity									madaz ir ir	0/00/0044		
								Last	Updated: 0	9/09/2014		

Fig. 1: Hartleys Cost Assumptions

	Underground on	ıly		Open Pit					
	Total	US\$/t ore	US\$/t Zn eq	Total	US\$/t ore	US\$/t Zn eq	Total	US\$/t ore	US\$/t Zn eq
Mine life	11			3			14		_
Ore	36.1			9.9			46.0		
grade Zn	5.8%			3.1%			5.2%		
grade Pb	0.5%			0.6%			0.5%		
Payable Zn Mlb	3,522			500			4,022		
Payable Pb Mlb	198			60			258		
Payable Zn eq Mlb*	3,700			554			4,255		
Mining	975	27.0	0.26	69	7.0	0.12	1,044	22.7	0.25
Processing	508	14.1	0.14	165	16.8	0.30	673	14.6	0.16
Overheads (inc corporate)	507	14.0	0.14	102	10.4	0.18	609	13.3	0.14
Logistics	361	10.0	0.10	99	10.0	0.18	460	10.0	0.11
Royalties	207	5.7	0.06	32	3.3	0.06	239	5.2	0.06
Smelter fees	576	16.0	0.16	83	8.4	0.15	659	14.3	0.15
Operating Costs	1,991	55.1	0.54	336	34.1	0.61	2,327	50.6	0.55
+ logistics	2,352	65.1	0.64	435	44.1	0.78	2,786	60.6	0.65
+ royalties	2,558	70.8	0.69	467	47.4	0.84	3,025	65.8	0.71
+ smelting	3,135	86.8	0.85	550	55.8	0.99	3,684	80.1	0.87
TOTAL CASH COSTS	3,135	86.8	0.85	550	55.8	0.99	3,684	80.1	0.87
* assume Zn / Pb price ration	of 111%								

Source: Hartleys

PRICE TARGET

We have increased our price target to \$0.34 (from \$0.26).

Fig. 2: Price Target Methodology

Price Target Methodology	Weighting	Spot	12 mth out
NPV base case, assuming significant equity dilution	13%	\$0.27	\$0.27
NPV at spot commodity and fx prices	30%	\$0.24	\$0.24
NPV using spot fx, but zinc prices a US\$1.37/lb	5%	\$0.50	\$0.53
NPV upper end consensus profile	5%	\$0.55	\$0.58
AUD zinc price calls (1.9Mt over 12yrs, avg strike @A\$0.92/lb)	17%	\$0.47	\$0.47
Net cash	25%	\$0.01	\$0.01
NPV using spot fx, but zinc prices at US\$1.60/lb, no equity dilution	5%	\$1.75	\$1.96
Risk weighted composite		\$0.33	
12 Months Price Target		\$0.34	
Shareprice - Last		\$0.150	
12 mth total return (% to 12mth target + dividend)		127%	

Source: Hartleys

Fig. 3: Companies with high exposure to zinc prices are very volatile, but have an ability to "rocket" from the bottom of a zinc cycle



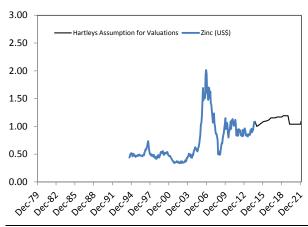
Source: Hartleys, IRESS

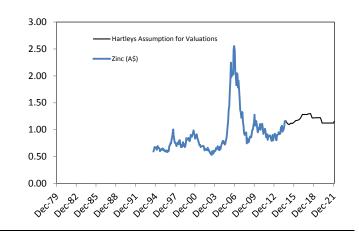
Fig. 4: Zinc price revisions

Assumptions for valuations					Foreca	asts					Revisi	on		
	Unit	Spot	FY15e	FY16e	FY17e	FY18e	FY19e	Long run	FY15e	FY16e	FY17e	FY18e	FY19e	Long run
			yr avg	assump.	yr avg	assump.								
US\$/A\$	/A\$	0.925	0.91	0.94	0.91	0.90	0.97	0.93	0.0%	0.0%	0.0%	0.0%	3.6%	2.0%
Zinc (US\$)	/lb	1.08	1.01	1.08	1.13	1.16	1.18	1.04	3.2%	4.8%	4.0%	3.3%	8.9%	0.4%
Zinc (A\$)	/lb	1.17	1.11	1.15	1.24	1.29	1.22	1.12	3.2%	4.8%	4.0%	3.3%	5.1%	-1.5%
Lead (US\$)	/lb	0.99	1.01	1.05	1.07	1.09	1.09	0.94	0.3%	1.2%	1.1%	0.7%	5.2%	-4.8%
Lead (A\$)	/lb	1.07	1.11	1.11	1.17	1.21	1.13	1.01	0.3%	1.2%	1.1%	0.7%	1.6%	-6.7%

Source: Hartleys, IRESS

Fig. 5: Zinc Price assumptions





Source: Hartleys, Bloomberg

Fig. 6: Key assumptions and risks for valuation

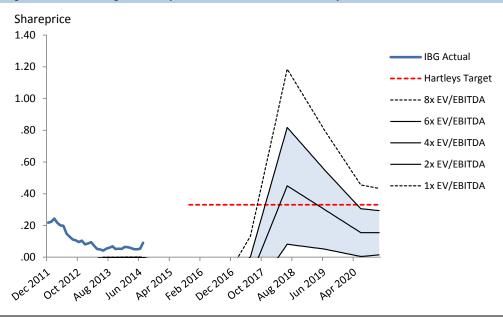
Assumption	Risk of not realising assumption	Downside risk to valuation if assumption is incorrect	Comment
Fourteen year mine life	Low	Upside	The current high grade resource implies a mine life of >15years.
Zinc price rises	Moderate	Meaningful	Our zinc price assumptions imply prices rise over coming years.
Large proportion of capex is funded with debt	Moderate to high	Not meaningful	The long mine life should support debt funding
Conservatively, we don't assume NFC exercises its right to purchase 19.9% of the project.	Moderate	Upside	We assume the project equity is financed by IBG shareholders, and they do not receive an equity injection from a "farm-out"
Limited value for exploration and other projects	Moderate	Upside	The other assets may have exploration success
Conclusion	IBG still has funding risk,	which reduces as zinc p	orices increase (in our view). Consequently, we view

IBG as leveraged to rising zinc prices.

Source: Hartleys

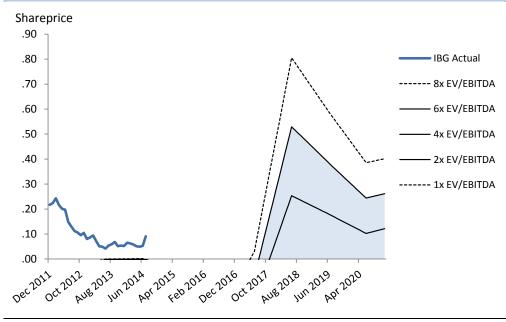
EV/EBITDA BANDS

Fig. 7: Using <u>Hartleys base case commodity</u> forecasts



Source: Hartleys Estimates, IRESS

Fig. 8: Using spot commodity prices



Source: Hartleys Estimates, IRESS

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Hartleys Recommendation Categories

Buy Share price appreciation anticipated	Buv	Share price	appreciation	anticipated
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Accumulate Share price appreciation anticipated but the risk/reward is

not as attractive as a "Buy". Alternatively, for the share price to rise it may be contingent on the outcome of an uncertain or distant event. Analyst will often indicate a

price level at which it may become a "Buy".

Neutral Take no action. Upside & downside risk/reward is evenly

balanced

Reduce / It is anticipated to be unlikely that there will be gains over Take profits the investment time horizon but there is a possibility of

some price weakness over that period.

Sell Significant price depreciation anticipated.

No Rating No recommendation.

Speculative Share price could be volatile. While it is anticipated that, Buy on a risk/reward basis, an investment is attractive, there

on a risk/reward basis, an investment is attractive, there is at least one identifiable risk that has a meaningful possibility of occurring, which, if it did occur, could lead to significant share price reduction. Consequently, the

investment is considered high risk.

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