



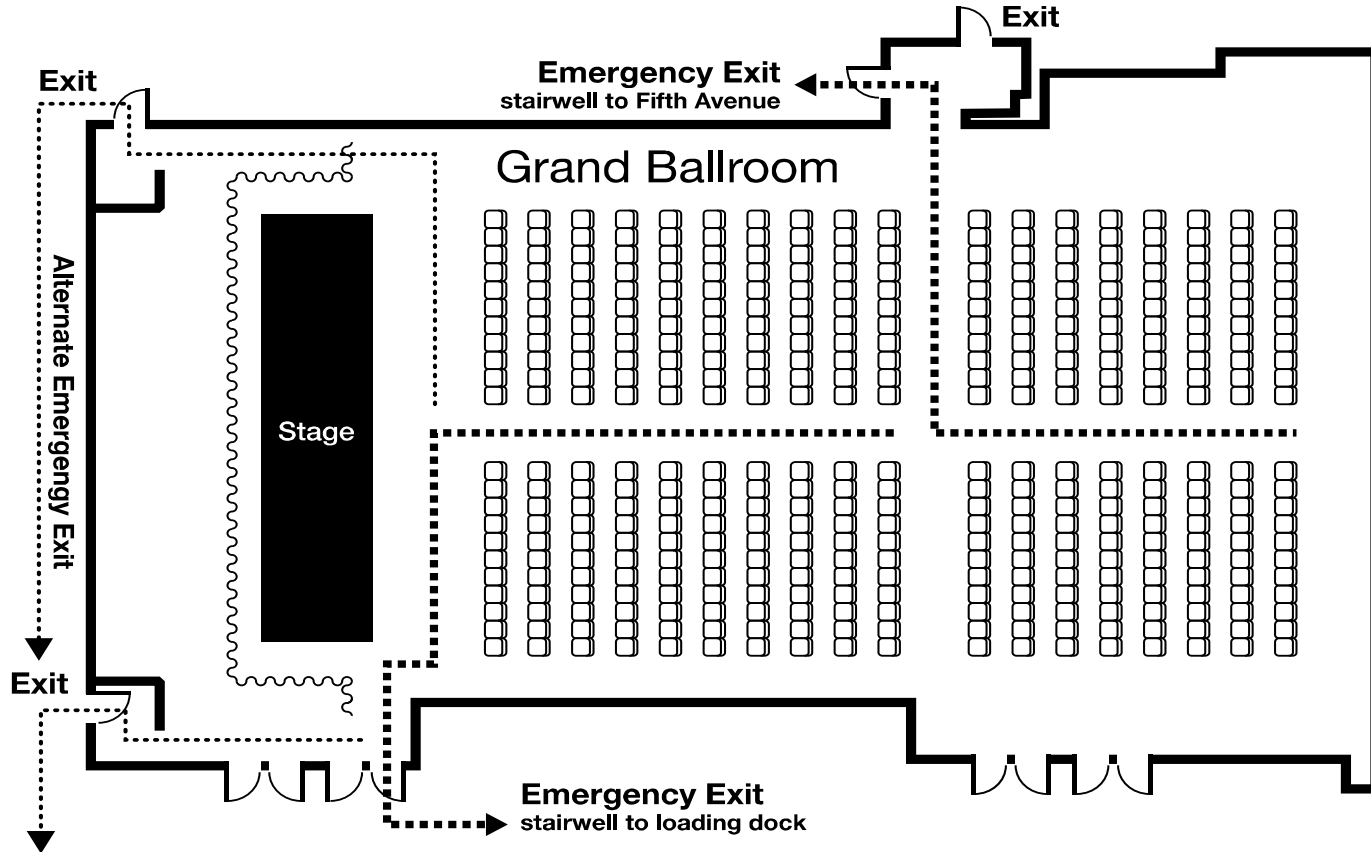
Advancing each generation.



Annual Meeting of Shareholders

May 1, 2015

Safety Instructions



Agenda

- **Welcome and Call Meeting to Order – Klaus Kleinfeld, Chairman and Chief Executive Officer**
 - Introduce Alcoa Directors
 - Introduce Executive Council
- **Items of Business – Audrey Strauss, Executive Vice President, Chief Legal Officer and Secretary**
- **Voting / Preliminary Results of Voting – Audrey Strauss**
- **Adjournment of Business Portion of the Meeting – Audrey Strauss**
- **Report of the Chairman and Chief Executive Officer – Klaus Kleinfeld**
- **Questions and Answers**

Director Nominees



Kathryn S. Fuller
Chair, Smithsonian
National
Museum of Natural
History
Director since 2002



Patricia F. Russo
Former CEO,
Alcatel-Lucent
**Director since
2008**



L. Rafael Reif
President,
Massachusetts
Institute of
Technology
Director since 2015



Ernesto Zedillo
Director, Yale Center for the
Study of Globalization
Director since 2002

Directors



Arthur D. Collins, Jr.
Former Chairman and CEO
Medtronic, Inc.
Director since 2010



Michael G. Morris
Former Chairman and
President and CEO
American Electric Power
Company, Inc.
Director since 2008



E. Stanley O'Neal
Former Chairman and
CEO
Merrill Lynch & Co., Inc.
Director since 2008



Carol L. Roberts
Senior Vice President
and CFO
International Paper
Company
Director since 2014

Directors



**Klaus
Kleinfeld**
Chairman and
CEO
Alcoa Inc.
**Director since
2003**



James W. Owens
Former Chairman and
CEO
Caterpillar Inc.
Director since 2005



Sir Martin Sorrell
Founder, CEO and Director
WPP plc
Director since 2012



Ratan N. Tata
Chairman Emeritus
Tata Sons Limited
Director since 2007

Distinguished Service

Judith M. Gueron

Lead Director since 2010
Director since 1988



Executive council

Libby Archell	VP, Chief Communications Officer
John Bergen	VP, Corporate Projects
Graeme Bottger	EVP & President, Alcoa Global Business Services
Daniel Cruise	VP, Government Affairs and Business Development
Leigh Ann Fisher	Chief Financial Officer, Global Primary Products
Ken Giacobbe	Chief Financial Officer, Engineered Products and Solutions
Roy Harvey	EVP, Human Resources and Environment, Health, Safety and Sustainability
Olivier Jarrault	EVP & Group President, Engineered Products and Solutions
Christian Jepsen	VP, Corporate Development
Ray Kilmer	EVP, Chief Technology Officer
Klaus Kleinfeld	Chairman & Chief Executive Officer
Gerhard Kschwendt	VP, Business Excellence and Corporate Strategy
Kay Meggers	EVP & Group President, Global Rolled Products
Glenn Miller	Chief Financial Officer, Global Rolled Products
William Oplinger	EVP & Chief Financial Officer
Eric Roegner	Chief Operating Officer, Alcoa Investment Castings, Forgings and Extrusions & President, Alcoa Defense
Tómas Sigurdsson	Chief Operating Officer, Global Primary Products
Audrey Strauss	EVP, Chief Legal Officer and Secretary
Robert Wilt	EVP & Group President, Global Primary Products
Kenneth Wisnoski	VP & President, International Project Development and Asset Management

Items of Business

- Election of the Four Director Nominees to Serve for a Three-Year Term Expiring in 2018
- Ratification of Appointment of PricewaterhouseCoopers LLP as the Company's Independent Registered Public Accounting Firm for 2015
- Advisory Vote to Approve Executive Compensation

Voting and Preliminary Results of Voting

- Ballots
- Opening of voting polls
- Closing of voting polls
- Preliminary results

Important Information

Forward-Looking Statements

This presentation contains statements that relate to future events and expectations and, as such, constitute forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995. Forward-looking statements include those containing such words as “anticipates,” “believes,” “could,” “estimates,” “expects,” “forecasts,” “intends,” “may,” “outlook,” “plans,” “projects,” “seeks,” “sees,” “should,” “targets,” “will,” or other words of similar meaning. All statements that reflect Alcoa’s expectations, assumptions or projections about the future, other than statements of historical fact, are forward-looking statements, including, without limitation, forecasts concerning global demand growth for aluminum, end market conditions, supply/demand balances, and growth opportunities for aluminum in automotive, aerospace, and other applications; targeted financial results or operating performance; statements about Alcoa’s strategies, outlook, and business and financial prospects; and statements regarding the acceleration of Alcoa’s portfolio transformation, including the expected benefits of acquisitions, including the completed acquisitions of the Firth Rixson business and TITAL, and the pending acquisition of RTI International Metals, Inc. (RTI). These statements reflect beliefs and assumptions that are based on Alcoa’s perception of historical trends, current conditions and expected future developments, as well as other factors management believes are appropriate in the circumstances. Forward-looking statements are subject to a number of risks, uncertainties, and other factors and are not guarantees of future performance. Important factors that could cause actual results to differ materially from those expressed or implied in the forward-looking statements include: (a) material adverse changes in aluminum industry conditions, including global supply and demand conditions and fluctuations in London Metal Exchange-based prices and premiums, as applicable, for primary aluminum, alumina, and other products, and fluctuations in index-based and spot prices for alumina; (b) deterioration in global economic and financial market conditions generally; (c) unfavorable changes in the markets served by Alcoa, including aerospace, automotive, commercial transportation, building and construction, packaging, defense, and industrial gas turbine; (d) the impact of changes on costs and results in foreign currency exchange rates, particularly the Australian dollar, Brazilian real, Canadian dollar, euro, and Norwegian kroner; (e) increases in energy costs or the unavailability or interruption of energy supplies; (f) increases in the costs of other raw materials; (g) Alcoa’s inability to achieve the level of revenue growth, cash generation, cost savings, improvement in profitability and margins, fiscal discipline, or strengthening of competitiveness and operations (including moving its alumina refining and aluminum smelting businesses down on the industry cost curves and increasing revenues and improving margins in its Global Rolled Products and Engineered Products and Solutions segments) anticipated from its restructuring programs and productivity improvement, cash sustainability, technology, and other initiatives; (h) Alcoa’s inability to realize expected benefits, in each case as planned and by targeted completion dates, from acquisitions (including achieving the expected levels of synergies, revenue growth, or EBITDA margin improvement), sales of assets, closures or curtailments of facilities, newly constructed, expanded, or acquired facilities, or international joint ventures, including the joint venture in Saudi Arabia; (i) risks relating to operating globally, including geopolitical, economic, and regulatory risks and unexpected events beyond Alcoa’s control, such as unfavorable changes in laws and governmental policies, civil unrest, imposition of sanctions, expropriation of assets, major public health issues, and terrorism; (j) the outcome of contingencies, including legal proceedings, government or regulatory investigations, and environmental remediation; (k) the impact of cyber attacks and potential information technology or data security breaches; (l) failure to receive the required votes of RTI’s shareholders to approve the merger of RTI with Alcoa; (m) failure to receive, delays in the receipt of, or unacceptable or burdensome conditions imposed in connection with, all required regulatory approvals of the acquisition of RTI, or the failure to satisfy the other closing conditions to the acquisition; (n) the risk that acquisitions (including Firth Rixson, TITAL and the pending RTI acquisition) will not be integrated successfully or such integration may be more difficult, time-consuming or costly than expected; (o) the possibility that certain assumptions with respect to RTI or the acquisition could prove to be inaccurate, including the expected timing of closing; (p) the loss of customers, suppliers and other business relationships as a result of acquisitions, competitive developments, or other factors; (q) the potential failure to retain key employees of Alcoa or acquired businesses; (r) the effect of an increased number of Alcoa shares outstanding as a result of the acquisition of RTI; (s) the impact of potential sales of Alcoa common stock issued in the RTI acquisition; (t) failure to successfully implement, to achieve commercialization of, or to realize expected benefits from, new or innovative technologies, equipment, processes, or products, including the Micromill™, innovative aluminum wheels, and advanced alloys; and (u) the other risk factors summarized in Alcoa’s Form 10-K for the year ended December 31, 2014, and other reports filed with the Securities and Exchange Commission. Alcoa disclaims any obligation to update publicly any forward-looking statements, whether in response to new information, future events or otherwise, except as required by applicable law. Market projections are subject to the risks discussed above and other risks in the market.

Important Information

Non-GAAP Financial Measures

Some of the information included in this presentation is derived from Alcoa's consolidated financial information but is not presented in Alcoa's financial statements prepared in accordance with accounting principles generally accepted in the United States of America (GAAP). Certain of these data are considered "non-GAAP financial measures" under SEC rules. These non-GAAP financial measures supplement our GAAP disclosures and should not be considered an alternative to the GAAP measure. Reconciliations to the most directly comparable GAAP financial measures and management's rationale for the use of the non-GAAP financial measures can be found in the Appendix to this presentation and on our website at www.alcoa.com under "About-Corporate Governance-Annual Meeting." Any reference to historical EBITDA means adjusted EBITDA, for which we have provided calculations and reconciliations in the Appendix and on our website. Alcoa has not provided a reconciliation of any forward-looking non-GAAP financial measure to the most directly comparable GAAP financial measure, due primarily to variability and difficulty in making accurate forecasts and projections, as not all of the information necessary for a quantitative reconciliation is available to Alcoa without unreasonable effort.

Additional Information and Where to Find It

This presentation does not constitute an offer to sell or the solicitation of an offer to buy any securities or a solicitation of any vote or approval nor shall there be any sale of securities in any jurisdiction in which such offer, solicitation or sale would be unlawful prior to registration or qualification under the securities laws of any such jurisdiction. The proposed business combination transaction between Alcoa and RTI will be submitted to the shareholders of RTI for their consideration. Alcoa has filed with the Securities and Exchange Commission (SEC) a Registration Statement on Form S-4 (Registration No. 333-203275) containing a preliminary proxy statement of RTI that also constitutes a prospectus of Alcoa. These materials are not yet final and will be amended. RTI will provide the proxy statement/prospectus to its shareholders after the registration statement has become effective. Alcoa and RTI also plan to file other documents with the SEC regarding the proposed transaction. This document is not a substitute for any prospectus, proxy statement or any other document which Alcoa or RTI may file with the SEC in connection with the proposed transaction. INVESTORS AND SECURITY HOLDERS OF RTI ARE URGED TO READ THE PROXY STATEMENT/PROSPECTUS AND ANY OTHER RELEVANT DOCUMENTS THAT WILL BE FILED WITH THE SEC CAREFULLY AND IN THEIR ENTIRETY WHEN THEY BECOME AVAILABLE BECAUSE THEY WILL CONTAIN IMPORTANT INFORMATION ABOUT THE PROPOSED TRANSACTION. You may obtain copies of all documents filed with the SEC regarding this transaction, free of charge, at the SEC's website (www.sec.gov). You may also obtain these documents, free of charge, from Alcoa's website (www.alcoa.com). You may also obtain these documents, free of charge, from RTI's website (www.rtiintl.com).

Participants in the Solicitation

Alcoa, RTI, and certain of their respective directors, executive officers and other members of management and employees may be deemed to be participants in the solicitation of proxies from RTI shareholders in connection with the proposed transaction. Information regarding the persons who may, under the rules of the SEC, be deemed participants in the solicitation of RTI shareholders in connection with the proposed transaction is set forth in the proxy statement/prospectus. You can find information about Alcoa's executive officers and directors in its definitive proxy statement filed with the SEC on March 19, 2015, its Annual Report on Form 10-K filed with the SEC on February 19, 2015 and in the above-referenced Registration Statement on Form S-4. You can find information about RTI's executive officers and directors in the proxy statement/prospectus and in RTI's Annual Report on Form 10-K filed with the SEC on February 26, 2015. You can obtain free copies of these documents from Alcoa and RTI as described in the preceding paragraph.



Advancing each generation.



Klaus Kleinfeld

Chairman and Chief Executive Officer

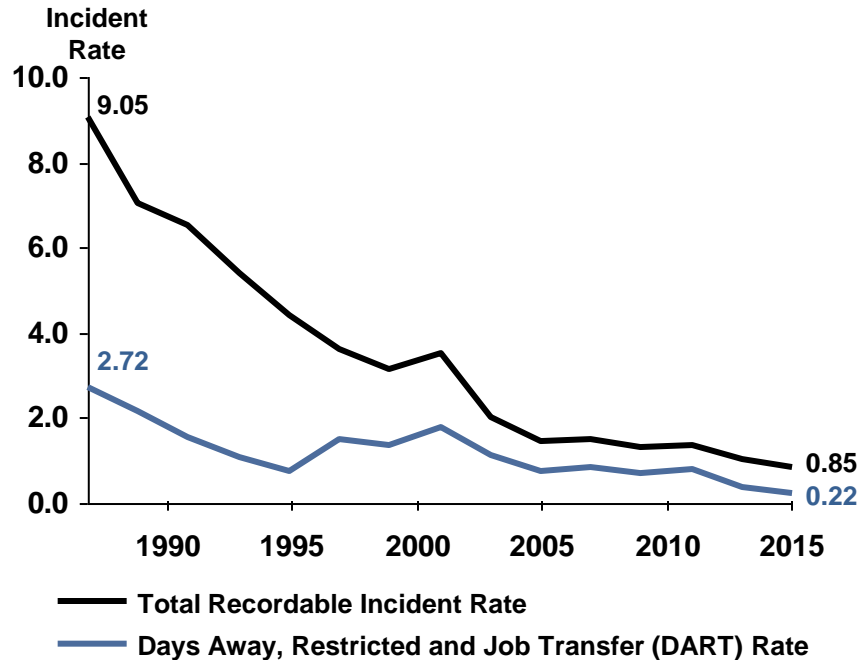
Annual Meeting of Shareholders

May 1, 2015

Heightening Efforts on Safety

Alcoa Safety Statistics and Action Plans

Safety Performance



Aggressive Action Plans to Eliminate Fatalities

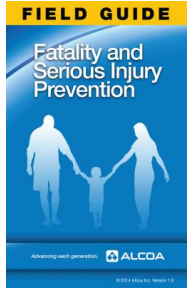
Existing Programs/Tools



STOP for Safety
Coin Campaign
If you're unsure, **STOP** and Seek Help.
Safety Begins with You.

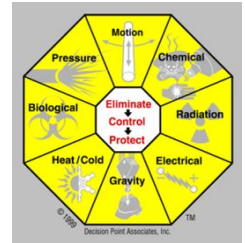


[Click here](#) to access campaign materials and resources.



Redoubling Efforts

- New Hazard Recognition Tools
- Find It, Fix It, Share It Program
- Recertifying Human Performance
- Challenging our layers of protection



Alcoa Delivers on its Commitments: 6th Straight Year Achieving Targets

Examples of Operational and Financial Execution and 2014 Performance

Multi-Year Successful Execution Track Record (2009-2014)

Operational Excellence

- **\$7.9B of Productivity¹**
- **9 Days Working Capital** reduction²
- **\$3B Free Cash Flow²** generated

Disciplined Capital Allocation

- **Saudi Arabia JV project on time and on budget**
- **Auto sheet expansions on plan** in IA & TN
- **Organic aerospace** projects (i.e., Al-Li)
- Completed **Firth Rixson** and **Tital** acquisitions; announced **RTI**

2014 Performance

Operating Earnings³

Tripled ✓
Year-on-Year

Capital Allocation⁴

\$1,219M ✓
Target: \$1,250M

Days Working Capital

28 days ✓
-9 days since 2009

Free Cash Flow⁵

\$455M ✓
Target: Positive

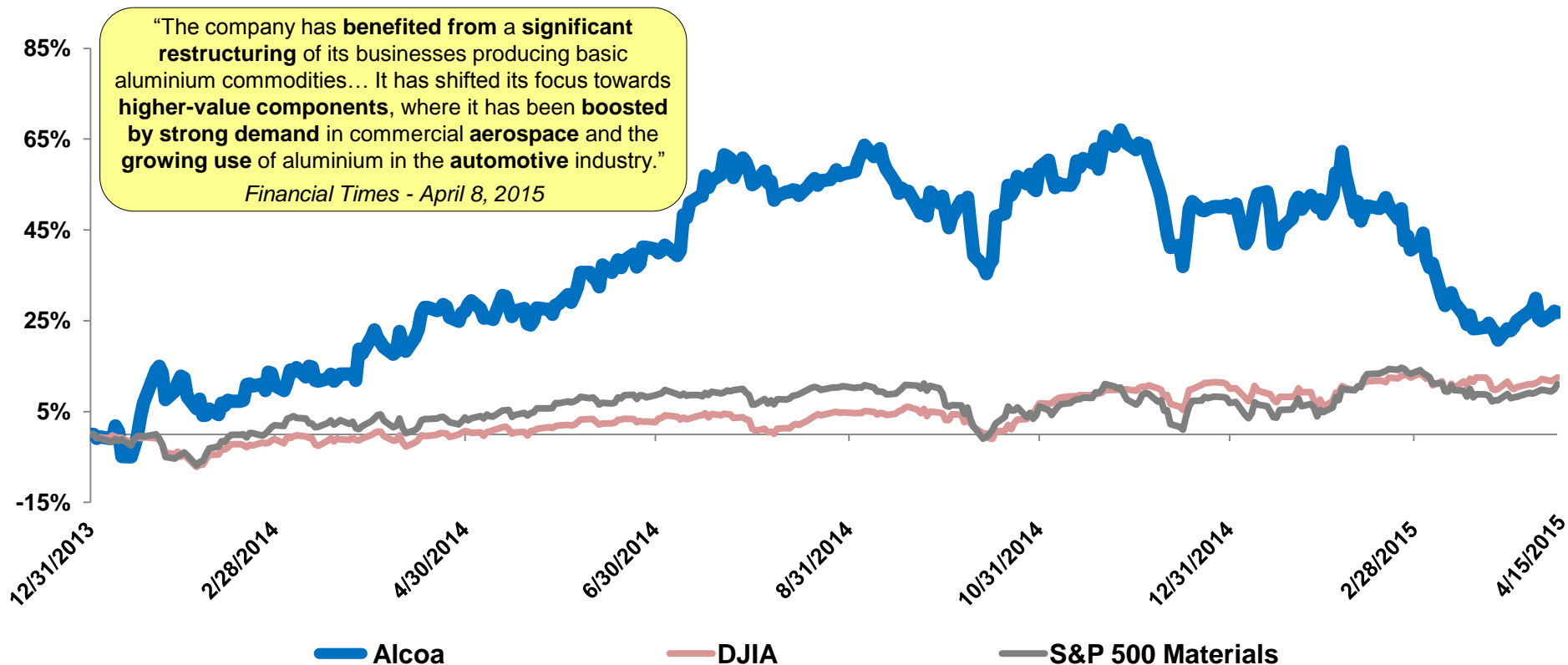
Productivity¹

\$1,194M ✓
Target: \$850M

1) 2009-2014 Productivity figures, pretax and pre-minority interest. 2009/2010 represent net productivity. 2011-2014 represent gross productivity. 2) Reflects 2009 – 2014; Cash from Operations for the same period was \$10.6B. 3) Represents Net Income excluding special items. 4) Excludes \$91M equity investment in Saudi JV. 5) 2014 Cash from Operations was \$1,674M.

Transformation Focus on Driving Shareholder Returns for the Near to Long-term

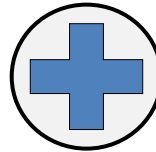
Alcoa Relative TSR Performance vs. Indices



Alcoa Transformation – Creating Compelling Sustainable Shareholder Value

Building a Lightweight Multi-Material Innovation Powerhouse

- **Increasing share in exciting growth markets**
(e.g., aerospace, automotive, heavy duty truck and trailer, building and construction)
- **Full pipeline** of innovative products and solutions
- Using all **growth levers**
- **Shifting** mix to **higher value-add**
- **Expanding multi-material, technology and process expertise**



Creating a Globally Competitive Commodity Business

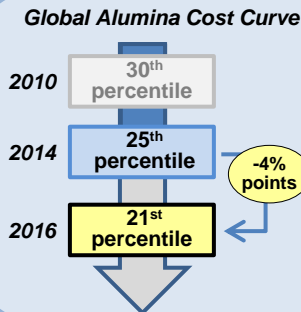
- **Increasing competitiveness, mitigating downside risk**
- **Optimizing the casthouse value-add portfolio**
- **Shifting pricing** to reflect market fundamentals
- Continuing to drive **productivity improvements**

Commodity Strategy Yielding Positive Results

Commodity Business Metrics: 2010 and 2014 Actual, 2016 Targets, 2015 12-Month Strategic Review, and 2010-2014 Actual Results

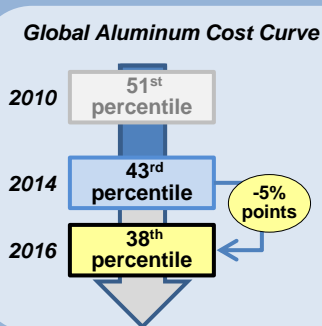
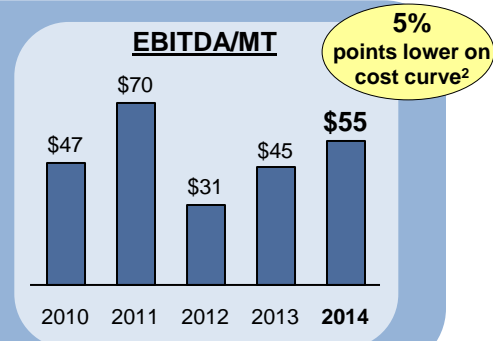
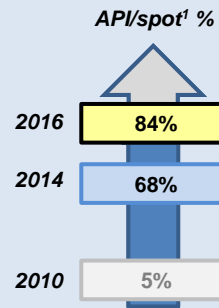
Lower Cost and Enhance Revenue...

...On Track



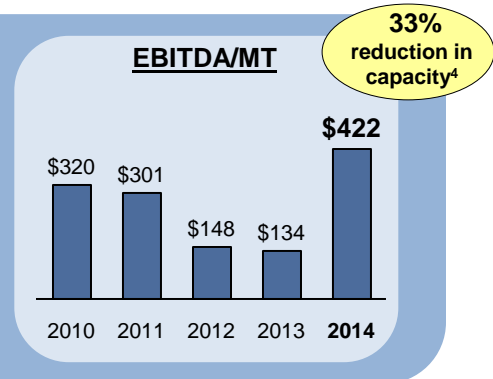
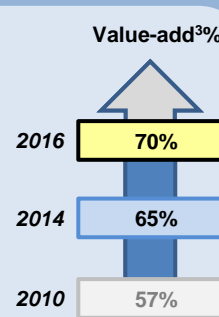
2015:
2.8 MMT
refining
capacity
under review

- ✓ Curtail Suralco: 443 kMT
- ✓ Secure WA Gas Contract



2015:
500 kMT
smelting
capacity
under review

- ✓ Curtail São Luís: 74 kMT

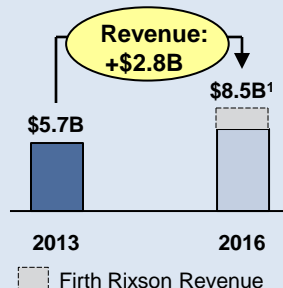


Value-Add Growth Driving Strong Results

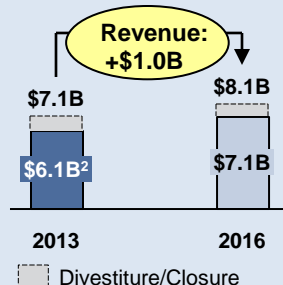
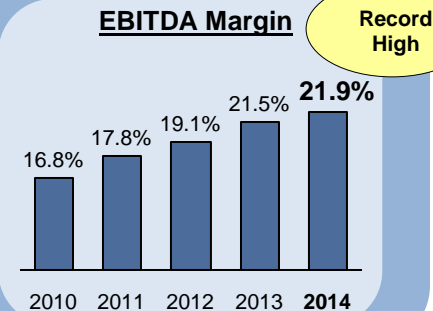
Key Value-Add Business Metrics: 2013 Actual, 2016 Targets and 2010-2014 Actual Results

Grow from Innovation and Share Gains...

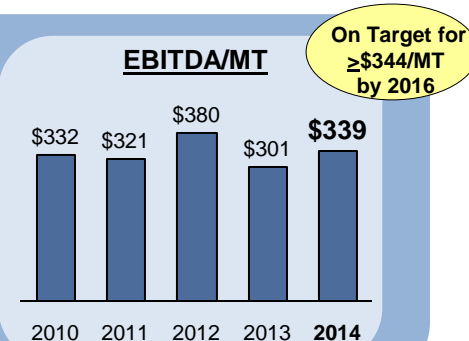
...On Track



2016 Target:
EBITDA margin exceeding
historical high
of 21.5%



2016 Target:
EBITDA/MT at or above
average historical high
of \$344/MT³



1) Includes forecasted Firth Rixson revenue of \$1.6B in 2016. 2) Adjusted to exclude ~\$975M related to 5 rolling mills closed or sold in Australia, Spain and France in 2014.

3) Represents average of the EBITDA/MT for years 2010 through 2012.

Organic and Inorganic Growth Expands Higher Value-Add Portfolio

Summary of Key Innovations, Growth Projects, and Inorganic Investments

Organic Growth through Innovation

Automotive



Aluminum Intensive Vehicles

Alcoa 951

Building & Construction



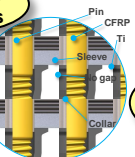
Bloomframe®

OptiQ™ Ultra Thermal Window



Aerospace

Flite-Tite® Fasteners



Structural Engine Components



Saudi Arabia Rolling Mill



Monolithic Wing Rib



Al-Lithium Forged Fan Blade



3-D Multi-wall Airfoils



Packaging

Inner PE coating
Aluminum
Middle PE coating
Paperboard
Outer PE coating

Aseptic Foil



Cool Twist Bottle

Commercial Transport



Ultra ONE™



Dura-Bright EVO™

Inorganic Growth in Robust Aerospace Market



(Closed 4Q14)

Leading product portfolio across all major jet engine components



Rings



Disks

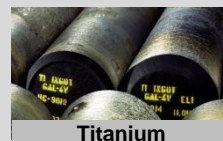


Metal

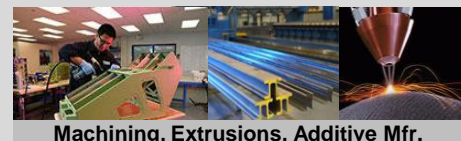


(Close expected in 2 to 5 months)

Portfolio of **Titanium** offerings, complements mid and downstream value chain



Titanium



Machining, Extrusions, Additive Mfr.



(Closed 1Q15)

Titanium and aluminum jet engine and airframe structural castings



Structural Castings

Note: Close of RTI transaction expected in 2-5 months (from April 8, 2015) subject to regulatory approvals and RTI shareholder approval.

Game Changing Innovation: Alcoa Invents Next-Gen Automotive Solutions

Micromill's Innovation in Automotive Alloys, Value Proposition, and Development Progress

Breakthrough Al Alloy + Casting Technology



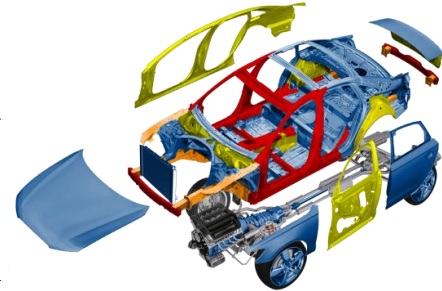
- **2x more formable**, while **30% lighter** than HSS
- **Reduces OEM system cost** from streamlined alloy portfolio
- Attack share of **\$3.5B of steel auto applications**
- **20 day** rolling process to **20 minutes**
- **50% lower energy** use
- **1/4 the footprint** of conventional mill

Stronger, Better, Faster: Win for the Customer and Alcoa

Advanced impact: equivalent to steel crash resistance at **30-40% lighter** vs. HSS

Higher formability: allows multiple parts to **single piece** consolidation; **reduces assembly costs 4-8%** vs. ingot based Al

Higher strength: can replace HSS parts; **eliminates** dissimilar metal joining issues; **reduces weight 25-35%** vs. HSS



■ Current alloys⁽¹⁾ ■ High formability⁽¹⁾
■ Advanced impact⁽²⁾ ■ High strength⁽²⁾

Moving Forward

✓
Completed
successful
customer trials

✓
Qualification in
progress at first
customer

✓
Executed
agreements to
qualify with 5
additional OEMs

First
commercial coil

Exploring
Full Scale Capacity
Expansion Options

■ Completed ■ In Process

1) In late stage of development. 2) In early stage of development.
HSS = High Strength Steel

Advancing each generation.



Advancing Each Generation; Alcoa's Transformation Continues

Invented Aluminum



Aluminum Applications & Globalization



Multi-Material Solutions



RECONCILIATIONS

Days Working Capital

(\$ in millions)

	Quarter ended											
	31-Mar-12	30-Jun-12	30-Sep-12	31-Dec-12	31-Mar-13	30-Jun-13	30-Sep-13	31-Dec-13	31-Mar-14	30-Jun-14	30-Sep-14	31-Dec-14
Receivables from customers, less allowances	\$1,709	\$1,650	\$1,600	\$1,573	\$1,704	\$1,483	\$1,427	\$1,383	\$1,391	\$1,401	\$1,526	\$1,513
Add: Deferred purchase price receivable ⁽¹⁾	85	144	104	53	50	223	347	339	238	371	438	395
Receivables from customers, less allowances, as adjusted	1,794	1,794	1,704	1,626	1,754	1,706	1,774	1,722	1,629	1,772	1,964	1,908
Add: Inventories	3,079	3,097	3,051	2,894	2,961	2,949	2,932	2,783	2,974	3,201	3,194	3,064
Less: Accounts payable, trade	2,660	2,594	2,496	2,587	2,656	2,820	2,746	2,816	2,813	2,880	3,016	3,021
Working Capital ⁽²⁾	\$2,213	\$2,297	\$2,259	\$1,933	\$2,059	\$1,835	\$1,960	\$1,689	\$1,790	\$2,093	\$2,142	\$1,951
Sales	\$6,006	\$5,963	\$5,833	\$5,898	\$5,833	\$5,849	\$5,765	\$5,585	\$5,454	\$5,836	\$6,239	\$6,377
Days Working Capital	34	35	36	30	32	29	31	28	30	33	32	28

Days Working Capital = Working Capital divided by (Sales/number of days in the quarter).

⁽¹⁾ The deferred purchase price receivable relates to an arrangement to sell certain customer receivables to several financial institutions on a recurring basis. Alcoa is adding back this receivable for the purposes of the Days Working Capital calculation.

⁽²⁾ The Working Capital for each period presented represents an average quarter Working Capital, which reflects the capital tied up during a given quarter. As such, the components of Working Capital for each period presented represent the average of the ending balances in each of the three months during the respective quarter.

Reconciliation of Free Cash Flow

(in millions)	Year ended						Total <u>2009-2014</u>
	<u>December 31, 2009</u>	<u>December 31, 2010</u>	<u>December 31, 2011</u>	<u>December 31, 2012</u>	<u>December 31, 2013</u>	<u>December 31, 2014</u>	
Cash from operations	\$1,365	\$2,261	\$2,193	\$1,497	\$1,578	\$1,674	\$10,568
Capital expenditures	(1,622)	(1,015)	(1,287)	(1,261)	(1,193)	(1,219)	(7,597)
Free cash flow	<u><u>\$(257)</u></u>	<u><u>\$1,246</u></u>	<u><u>\$906</u></u>	<u><u>\$236</u></u>	<u><u>\$385</u></u>	<u><u>\$455</u></u>	<u><u>\$2,971</u></u>

Free Cash Flow is a non-GAAP financial measure. Management believes that this measure is meaningful to investors because management reviews cash flows generated from operations after taking into consideration capital expenditures due to the fact that these expenditures are considered necessary to maintain and expand Alcoa's asset base and are expected to generate future cash flows from operations. It is important to note that Free Cash Flow does not represent the residual cash flow available for discretionary expenditures since other non-discretionary expenditures, such as mandatory debt service requirements, are not deducted from the measure.

Reconciliation of Adjusted Income

(in millions, except per-share amounts)	Income		Diluted EPS	
	Year ended		Year ended	
	December 31, 2013	December 31, 2014	December 31, 2013	December 31, 2014
Net (loss) income attributable to Alcoa	\$(2,285)	\$268	\$(2.14)	\$0.21
Restructuring and other charges	585	703		
Discrete tax items*	360	33		
Other special items**	1,697	112		
Net income attributable to Alcoa – as adjusted	\$357	\$1,116	0.33	0.92

Net income attributable to Alcoa – as adjusted is a non-GAAP financial measure. Management believes that this measure is meaningful to investors because management reviews the operating results of Alcoa excluding the impacts of restructuring and other charges, discrete tax items, and other special items (collectively, “special items”). There can be no assurances that additional special items will not occur in future periods. To compensate for this limitation, management believes that it is appropriate to consider both Net (loss) income attributable to Alcoa determined under GAAP as well as Net income attributable to Alcoa – as adjusted.

* Discrete tax items include the following:

- for the year ended December 31, 2014, a charge for the remeasurement of certain deferred tax assets of a subsidiary in Brazil due to a tax rate change (\$31), a charge for the remeasurement of certain deferred tax assets of a subsidiary in Spain due to a tax rate change (\$16), and a net benefit for a number of other items (\$14); and
- for the year ended December 31, 2013, a charge for valuation allowances related to certain Spain and U.S. deferred tax assets (\$372), a benefit related to the reinstatement under the American Taxpayer Relief Act of 2012 of two tax provisions that were applied in 2013 to Alcoa’s U.S income tax return for calendar year 2012 (\$19), a charge related to prior year taxes in Spain and Australia (\$10), and a net benefit for other miscellaneous items (\$3).

** Other special items include the following:

- for the year ended December 31, 2014, the write-down of inventory related to the permanent closure of a smelter in Italy, a smelter and two rolling mills in Australia, and a smelter in the United States (\$47), costs associated with current and future acquisitions of aerospace businesses (\$47), a gain on the sale of both a mining interest in Suriname and an equity investment in a China rolling mill (\$20), an unfavorable impact related to the restart of one potline at the joint venture in Saudi Arabia that was previously shut down due to a period of pot instability (\$19), costs associated with preparation for and ratification of a new labor agreement with the United Steelworkers (\$11), a net unfavorable change in certain mark-to-market energy derivative contracts (\$6), and a loss on the write-down of an asset to fair value (\$2); and
- for the year ended December 31, 2013, an impairment of goodwill (\$1,719), a net insurance recovery related to the March 2012 cast house fire at the Massena, NY location (\$22), a net favorable change in certain mark-to-market energy derivative contracts (\$15), an unfavorable impact related to a temporary shutdown of one of the two smelter potlines at the joint venture in Saudi Arabia due to a period of pot instability (\$9), and a write-down of inventory related to the permanent closure of two potlines at a smelter in Canada and a smelter in Italy (\$6).

Reconciliation of Alumina Adjusted EBITDA

(\$ in millions, except per metric ton amounts)	2010	2011	2012	2013	2014
After-tax operating income (ATOI)	\$301	\$607	\$90	\$259	\$370
Add:					
Depreciation, depletion, and amortization	406	444	455	426	387
Equity (income) loss	(10)	(25)	(5)	4	29
Income taxes	60	179	(27)	66	153
Other	(5)	(44)	(8)	(6)	(28)
Adjusted EBITDA	<u>\$752</u>	<u>\$1,161</u>	<u>\$505</u>	<u>\$749</u>	<u>\$911</u>
Production (thousand metric tons) (kmt)	15,922	16,486	16,342	16,618	16,606
Adjusted EBITDA / Production (\$ per metric ton)	\$47	\$70	\$31	\$45	\$55

Alcoa's definition of Adjusted EBITDA (Earnings before interest, taxes, depreciation, and amortization) is net margin plus an add-back for depreciation, depletion, and amortization. Net margin is equivalent to Sales minus the following items: Cost of goods sold; Selling, general administrative, and other expenses; Research and development expenses; and Provision for depreciation, depletion, and amortization. The Other line in the table above includes gains/losses on asset sales and other non-operating items. Adjusted EBITDA is a non-GAAP financial measure. Management believes that this measure is meaningful to investors because Adjusted EBITDA provides additional information with respect to Alcoa's operating performance and the Company's ability to meet its financial obligations. The Adjusted EBITDA presented may not be comparable to similarly titled measures of other companies.

Reconciliation of Primary Metals Adjusted EBITDA

(\$ in millions, except per metric ton amounts)	2010	2011	2012	2013	2014
After-tax operating income (ATOI)	\$488	\$481	\$309	\$(20)	\$594
Add:					
Depreciation, depletion, and amortization	571	556	532	526	494
Equity (income) loss	(1)	7	27	51	34
Income taxes	96	92	106	(74)	203
Other	(7)	2	(422)	(8)	(6)
Adjusted EBITDA	<u>\$1,147</u>	<u>\$1,138</u>	<u>\$552</u>	<u>\$475</u>	<u>\$1,319</u>
Production (thousand metric tons) (kmt)	3,586	3,775	3,742	3,550	3,125
Adjusted EBITDA / Production (\$ per metric ton)	\$320	\$301	\$148	\$134	\$422

Alcoa's definition of Adjusted EBITDA (Earnings before interest, taxes, depreciation, and amortization) is net margin plus an add-back for depreciation, depletion, and amortization. Net margin is equivalent to Sales minus the following items: Cost of goods sold; Selling, general administrative, and other expenses; Research and development expenses; and Provision for depreciation, depletion, and amortization. The Other line in the table above includes gains/losses on asset sales and other non-operating items. Adjusted EBITDA is a non-GAAP financial measure. Management believes that this measure is meaningful to investors because Adjusted EBITDA provides additional information with respect to Alcoa's operating performance and the Company's ability to meet its financial obligations. The Adjusted EBITDA presented may not be comparable to similarly titled measures of other companies.

Reconciliation of Engineered Products and Solutions Adjusted EBITDA

(\$ in millions)	2010	2011	2012	2013	2014
After-tax operating income (ATOI)	\$419	\$537	\$612	\$726	\$767
Add:					
Depreciation, depletion, and amortization	154	158	158	159	173
Equity loss (income)	(2)	(1)	—	—	—
Income taxes	198	258	297	348	374
Other	—	(1)	(9)	(2)	—
Adjusted EBITDA	<u>\$769</u>	<u>\$951</u>	<u>\$1,058</u>	<u>\$1,231</u>	<u>\$1,314</u>
Third-party sales	\$4,584	\$5,345	\$5,525	\$5,733	\$6,006
Adjusted EBITDA Margin	16.8%	17.8%	19.1%	21.5%	21.9%

Alcoa's definition of Adjusted EBITDA (Earnings before interest, taxes, depreciation, and amortization) is net margin plus an add-back for depreciation, depletion, and amortization. Net margin is equivalent to Sales minus the following items: Cost of goods sold; Selling, general administrative, and other expenses; Research and development expenses; and Provision for depreciation, depletion, and amortization. The Other line in the table above includes gains/losses on asset sales and other non-operating items. Adjusted EBITDA is a non-GAAP financial measure. Management believes that this measure is meaningful to investors because Adjusted EBITDA provides additional information with respect to Alcoa's operating performance and the Company's ability to meet its financial obligations. The Adjusted EBITDA presented may not be comparable to similarly titled measures of other companies.

Reconciliation of Global Rolled Products Adjusted EBITDA

(\$ in millions, except per metric ton amounts)	2010*	2011	2012	2013	2014
After-tax operating income (ATOI)	\$241	\$260	\$346	\$252	\$312
Add:					
Depreciation, depletion, and amortization	238	237	229	226	235
Equity loss	–	3	6	13	27
Income taxes	103	98	159	108	124
Other	1	1	(2)	–	(1)
Adjusted EBITDA	\$583	\$599	\$738	\$599	\$697
Total shipments (thousand metric tons) (kmt)	1,755	1,866	1,943	1,989	2,056
Adjusted EBITDA / Total shipments (\$ per metric ton)	\$332	\$321	\$380	\$301	\$339

Alcoa's definition of Adjusted EBITDA (Earnings before interest, taxes, depreciation, and amortization) is net margin plus an add-back for depreciation, depletion, and amortization. Net margin is equivalent to Sales minus the following items: Cost of goods sold; Selling, general administrative, and other expenses; Research and development expenses; and Provision for depreciation, depletion, and amortization. The Other line in the table above includes gains/losses on asset sales and other non-operating items. Adjusted EBITDA is a non-GAAP financial measure. Management believes that this measure is meaningful to investors because Adjusted EBITDA provides additional information with respect to Alcoa's operating performance and the Company's ability to meet its financial obligations. The Adjusted EBITDA presented may not be comparable to similarly titled measures of other companies.

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