The Supplier Sector: These are the Days, We will Remember

May 30, 2014

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OESA – Original Equipment Suppliers Association
“These are the Days” .... You Never Knew

Natalie Merchant was an Auto Analyst

- Sustainable year-over-year production increases in North America
- The worst year-over-year declines in Europe are over – financial charges will turn into financial gains
- South America and Thailand are new hot spots – but no where near the revenue/profit exposure
- Record number of vehicle and part program launches is forcing “I need you, you need me” collaboration
- Regulatory lull – yes, we have conflict minerals and other operational concerns – but we know the product regulations . . . Through 2018
- Macro-economic tailwinds: OK growth, no inflation, employment more positive than negative, gasoline +/- $3.50, credit interest rates and terms favorable
- For suppliers this means: cash flow, dividends, stock buy-backs, investment grade ratings, favorable valuations
The State of The Supply Base

- We are defining “the good old days” – at least by industry performance, maybe not by fun
- There is no room for error – learning to manage to constraint not excess
- The half life of what we know is being compressed – more product and process technology will be introduced in the next 10 years than the last 20
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OESA Automotive Supplier Sentiment Index
Positive Territory for 20 Straight Months

Question: Compared to two months ago, how has your 12 month outlook changed?

No. of Responses = 107
## North America

### 2014-2016 Production Forecast Comparison

(Volumes represent NA Car, Lt Truck class 1-5)

<table>
<thead>
<tr>
<th></th>
<th>1Q Actual</th>
<th>2Q Forecast</th>
<th>3Q Forecast</th>
<th>4Q Forecast</th>
<th>2014 Forecast</th>
<th>2015 Forecast</th>
<th>2016 Forecast</th>
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<tbody>
<tr>
<td><strong>Forecast</strong></td>
<td>4.19</td>
<td>4.39</td>
<td>4.10</td>
<td>4.14</td>
<td>16.82</td>
<td>17.46</td>
<td>17.60</td>
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<td></td>
<td>0.02</td>
<td>0.03</td>
<td>0.03</td>
<td>0.03</td>
<td>↑0.04</td>
<td>↓0.03</td>
<td>↓0.31</td>
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<tr>
<td><strong>IHS AUTOMOTIVE</strong></td>
<td>4.21</td>
<td>4.39</td>
<td>4.22</td>
<td>4.03</td>
<td>16.84</td>
<td>17.16</td>
<td>17.45</td>
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<td>0.07</td>
<td>0.03</td>
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<td>↑0.06</td>
<td>↓0.12</td>
<td>↑0.20</td>
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<tr>
<td><strong>LMC</strong></td>
<td>4.18</td>
<td>4.25</td>
<td>4.10</td>
<td>4.11</td>
<td>16.65</td>
<td>17.32</td>
<td>17.94</td>
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<td>0.07</td>
<td>0.05</td>
<td>0.02</td>
<td>↑0.12</td>
<td>↓0.02</td>
<td>↑0.18</td>
<td></td>
</tr>
<tr>
<td><strong>IRN</strong></td>
<td>4.17</td>
<td>4.53</td>
<td>4.13</td>
<td>3.93</td>
<td>16.76</td>
<td>17.28</td>
<td>17.60</td>
</tr>
<tr>
<td></td>
<td>0.04</td>
<td>0.04</td>
<td>0.03</td>
<td>↓0.07</td>
<td>↓0.05</td>
<td>↓0.02</td>
<td></td>
</tr>
<tr>
<td><strong>WELLS FARGO</strong></td>
<td>4.18</td>
<td>4.31</td>
<td>4.12</td>
<td>4.11</td>
<td>16.72</td>
<td>17.07</td>
<td>NA</td>
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<tr>
<td></td>
<td>0.02</td>
<td>0.02</td>
<td>Δ0</td>
<td>Δ0</td>
<td></td>
<td>↓0.16</td>
<td></td>
</tr>
</tbody>
</table>

### Forecast Average

|                | 4.19 | 4.37 | 4.13 | 4.06 | 16.76 | 17.26 | 17.65 |

### Forecast Spread

|                | 0.04 | 0.28 | 0.12 | 0.21 | 0.19  | 0.39  | 0.49  |

### 2013 Average

|                | 4.01 | 4.25 | 3.87 | 4.03 | 16.17 |      |      |

Δ compares prior reported forecast volume.

Last Updated: May 2014
Fixed Costs Keeping Pace with Demand – There is No Room For Error Anywhere in the Chain

Production will increase by 96 percent between 2009 and 2014 (using a 16.8 million projection) while breakeven levels will increase by just 34 percent.

Sources: IHS Automotive (December 2013) and January 2014 OESA Automotive Supplier Barometer

Published with the support of Deloitte LLP
The Supply Base is Stretched – There are a Number of Issues; Suppliers are Ahead of the Curve

Question: Over the next 3 months, will you face the following issues as you meet increased levels of production?

- **Skilled Labor Shortages**: 2014 - 71%, 2013 - 74%, 2012 - 61%
- **Production Overtime Premiums**: 2014 - 70%, 2013 - 80%, 2012 - 53%
- **Internal Manufacturing Capacity Constraints**: 2014 - 54%, 2013 - 61%, 2012 - 48%
- **Outbound-Expedited Freight**: 2014 - 48%, 2013 - 53%, 2012 - 31%
- **Inbound-Expedited Freight**: 2014 - 51%, 2013 - 54%, 2012 - 34%
- **Hourly Labor Shortages**: 2014 - 51%, 2013 - 28%, 2012 - 24%
- **Component Shortages**: 2014 - 40%, 2013 - 34%, 2012 - 23%
- **Liquidity Shortages within your supply base**: 2014 - 24%, 2013 - 20%, 2012 - 8%
- **Raw Material Shortages**: 2014 - 23%, 2013 - 15%, 2012 - 11%
- **Liquidity Shortages within your own company**: 2014 - 28%, 2013 - 23%, 2012 - 11%

No. of Responses = 87-91

OESA Automotive Supplier Barometer-January 2014 Published with the support of Deloitte, LLP
The State of The Supply Base

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• **There is no room for error** – learning to manage to constraint not excess

• The half life of what we know is being compressed – more product and process technology will be introduced in the next 10 years than the last 20.
No Room For Error: Top Quartile, 95% Utilization

Capacity Utilization data from the OESA Automotive Supplier Barometer May 2012, May 2013 and May 2014:

- Supplier Current Running Capacity (90%)
- Current + Warm-idled capacity (80%)
- Current + Warm + Cold-idled capacity (80%)

- When asked about utilization rates, the upper quartile of companies are running at 95%; 90% including their warm and cold-idled capacity— and this is at a 16.8 million unit level

- The lower quartile companies are operating at 80%; 70% including all available capacity

NAICS 3363 capacity utilization corrected in April 2013 to reflect updates in FRB dataset

Source: U. S. Federal Reserve Board of Governors
While Capacity Constraints are not Systemic; They are Focused in Capital-Intensive and Long-Leads

There has been a great amount of discussion about sourcing constraints down through the supply chain. What system area, that you build in to, has the most significant supply chain constraint?

No. of Responses = 99
OEMs Investing Billions in New Vehicle Launches – Each Provides Great Opportunities for Suppliers
Suppliers Support 2/3 the Value of a Vehicle – This Means Suppliers will Launch a Record Number of New Programs in 2014 and 2015

<table>
<thead>
<tr>
<th>Global Auto Revenue</th>
<th>Lower Quartile Value</th>
<th>Median Value</th>
<th>Upper Quartile Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>2014 Launches</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>More than $500 million</td>
<td>21</td>
<td>45</td>
<td>138</td>
</tr>
<tr>
<td>$151-$500 million</td>
<td>20</td>
<td>25</td>
<td>40</td>
</tr>
<tr>
<td>$150 million or less</td>
<td>15</td>
<td>35</td>
<td>73</td>
</tr>
<tr>
<td>2015 Launches</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>More than $500 million</td>
<td>20</td>
<td>31</td>
<td>75</td>
</tr>
<tr>
<td>$151-$500 million</td>
<td>25</td>
<td>30</td>
<td>50</td>
</tr>
<tr>
<td>$150 million or less</td>
<td>15</td>
<td>50</td>
<td>100</td>
</tr>
</tbody>
</table>

Given the record number of vehicle launches over the next 2 years, on average, how many new base part numbers will you be launching in 2014 and 2015?

No. of Responses = 75
OEMs and First Tiers are Focused on Their Suppliers Assuring Quality, Validating Capacity, and Supporting Launch and Production Schedules

Question:
What is the primary reason companies are being added to or continuing on the supplier "watch list?"
Suppliers are Implementing a Number of Supply Chain Risk Mitigation Efforts

**Percent of respondents**

- Increasing inventory or buffer stocks: 48%, 38%, 30%
- Increasing dual sources of materials: 50%, 39%, 30%
  - *Increasing regional dual sources of components*: 24%
  - *Increasing multi-region dual sources of components*: 24%
- Sourcing materials/components closer to the point of use: 34%, 22%, 12%
- Expediting shipments: 29%, 23%, 24%
- Increasing investments in IT systems or technologies: 20%, 24%, 25%
- Validating alternate materials: 36%, 33%, 29%
- Validating alternate components: 29%, 24%, 20%
- Reallocating production within existing supply base: 22%, 23%, 25%
- Simulating supply chain disruptions: 3%, 6%, 8%
- Other: 5%, 7%

*In 2012 ‘Increasing dual sources of components was indicated by 22% of respondents.
In 2011, Resourcing, adding new suppliers = 28% of respondents.

No. of Responses = 94

**Question:** What actions and strategies are being taken within your company to mitigate supply chain risk?
Harbour Results: Capacity Shortage Warning – The Tooling Industry Needs to Support 35% Growth by 2018

Future Demand is based on a 2012 baseline and estimated North American model launches (all new and major)

Source: LMC Automotive and IHS.
Variation from OEM to OEM relative to the overall usage of LCC tooling. In most cases, LCC tooling strategy is focused on lower complexity / non-time constrained parts.
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Window Sticker Fuel Economy is Rising – Needs to be at a 5% CAGR or 50% Greater Than Natural Market Forces
Material Complexity is Not a 2025 Vision – It is Today’s Vehicle

PERIODIC TABLE OF ATS

Acoustically laminated front windshield is lighter than tempered glass and helps reduce wind noise.

Advanced high strength steel grades, such as Martensitic steel, are used in rails and other energy absorbing parts of the structure.

Ultra high strength steel accounts for 10% of structure.

Low strength, mild steel is used to allow for crisp lines and high quality styled surfaces. This accounts for 32% of the structure.

Magnesium engine mounts are ultra-high strength and lighter than more traditional materials.

Copper is used throughout the ATS in electrical and non-electrical components, accounting for about 1.7% of the vehicle.
While the Automotive Geographic Footprint is Evolving – It Continues to Mean Incremental Expansion in the Growth Markets and Deepening Regional Supply Chain Capabilities

<table>
<thead>
<tr>
<th>Region</th>
<th>Highest Priority</th>
<th>Neutral</th>
<th>Neutral</th>
<th>Neutral</th>
<th>Neutral</th>
<th>Neutral</th>
<th>Lowest Priority</th>
<th>Average Ranking Value*</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>29%</td>
<td>17%</td>
<td>21%</td>
<td>9%</td>
<td>10%</td>
<td>7%</td>
<td>8%</td>
<td>3.1</td>
</tr>
<tr>
<td>Canada</td>
<td>5%</td>
<td>6%</td>
<td>5%</td>
<td>10%</td>
<td>16%</td>
<td></td>
<td>58%</td>
<td>6.0</td>
</tr>
<tr>
<td>Mexico</td>
<td>28%</td>
<td>27%</td>
<td>21%</td>
<td>7%</td>
<td>8%</td>
<td>6%</td>
<td>3%</td>
<td>2.7</td>
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<tr>
<td>Europe</td>
<td>9%</td>
<td>9%</td>
<td>17%</td>
<td>16%</td>
<td>11%</td>
<td>15%</td>
<td>24%</td>
<td>4.5</td>
</tr>
<tr>
<td>Japan/Korea</td>
<td>1%</td>
<td>8%</td>
<td>11%</td>
<td>8%</td>
<td>15%</td>
<td></td>
<td>57%</td>
<td>6.0</td>
</tr>
<tr>
<td>China</td>
<td>30%</td>
<td>30%</td>
<td>12%</td>
<td>6%</td>
<td>3%</td>
<td>2%</td>
<td>16%</td>
<td>2.9</td>
</tr>
<tr>
<td>South America</td>
<td>1%</td>
<td>5%</td>
<td>16%</td>
<td>22%</td>
<td>12%</td>
<td>17%</td>
<td>26%</td>
<td>5.0</td>
</tr>
<tr>
<td>Mid-East/Africa</td>
<td>3%</td>
<td>7%</td>
<td>4%</td>
<td>16%</td>
<td></td>
<td></td>
<td>70%</td>
<td>6.5</td>
</tr>
<tr>
<td>South Asia</td>
<td>4%</td>
<td>11%</td>
<td>11%</td>
<td>18%</td>
<td>9%</td>
<td>8%</td>
<td>39%</td>
<td>5.0</td>
</tr>
</tbody>
</table>

* 1= Highest Priority, 4=Neutral, 7= Lowest Priority

Considering your required production capacity needed to meet your targeted, regional business growth through 2020, rank the regions where you will need to expand capacity.

No. of Responses = 74-101
And That Applies to **Engineering Capabilities** as well as Production Capabilities

![Bar Chart](image)

**Question:** Considering your required engineering capability needed to meet your targeted, regional business growth through 2020, rank the regions where you will need to expand capabilities.

*1= Highest Priority, 4=Neutral, 7= Lowest Priority*

No. of Responses = 71-104
As OEM Market Shares Fractionalize (more local sales) and Electronic-Content Increases (value increases/weight), Trans-Pacific Partnership and the Transatlantic Investment & Trade May Equate Exports Around the World
To Pull All of this Off – Customer-Supplier Relationship Effectiveness Must Improve
OEM-Supplier Effectiveness Will Set Customers and Suppliers Apart

• **Providing Financial Progress Payments** – It’s all about being a customer of choice and lowering the cost to serve

• **Developing Cost Reduction Sharing Programs** – Do unto others . . . .

• **Assuring Required Technical/Engineering Support** – New materials, mechatronicware, new products
And This is More Than the OEM-First Tier: Supplier-to-Supplier Effectiveness at the Interface is Required

• **Improving Production Forecasting Accuracy and Communication** – OEMs to first tier have improved total, platform and even nameplate accuracy; next frontier is TRIM AND PT MIX

• **Improving Capacity Modeling and Verification** – The best first tiers have established single models to assure all customers they will fulfil contracts; but with no excess capacity, first tiers are implementing “go and see” as best they can to assure schedules are met

• **Enhancing Supplier Development Resources** – Resources must be available in good times and bad, in launch phase and in production
The Near-Term Outlook for Suppliers is Good

- 16.8 million unit NA production outlook for 2014 will be met
- It may not be optimized for vehicle (retail/fleet, option content) or cost (expedited freight, overtime)
- If the OEMs are launching 45-50 new vehicles in 2014; major suppliers are easily launching at least one new program per week
- Product, plant and people decisions made or played out in 2014 through 2017 will significantly shape the industry going forward
If There Is a Concern, It is:
The Automotive Squeeze Play

- **Revenue Growth Continues – But Slower, Incremental Growth**
  - NA: 600,000 to 500,000 to 400,000 year-over-year unit growth

- **Launches Drive Caution – Earnings Warnings**
  - Ford and suppliers noting caution on outlooks

- **Recalls Drive Panic**
  - 22 million units through May 2014 (2013 = 23 million)

- **Cash Goes to Shareholders (nothing wrong with that) and Warranty Reserves (non-value added)**
  - Ford shifts $1.8 billion to dividends and share buybacks; $400 million for reserves
Figure 3
Drivetrain Manufacturers
Average Warranty Claims & Accrual Rates
(as a % of product sales, 2003-2013)

Source: Warranty Week
OEMs – Sales Growing Faster than Warranty Claims and Accruals . . . 2014 will be an Inflection Point

Figure 4
U.S.-based Passenger Car Makers
Average Warranty Claims & Accrual Rates
(as a % of product sales, 2003-2013)

Source: Warranty Week
OESA:
The Voice, Forum and Resource for the NAFTA Supply Base

- **OEM Communication**: Open & productive dialogue on behalf of suppliers
- **Peer Group Councils**: Member-driven agendas & roundtables
- **Industry Studies**: Benchmarking, trends, analysis, best practices
- **Member Surveys**: Industry trends & supplier best practices
- **OESA Events**: Thought leadership on critical topics
- **Advocacy & Voice in DC and the States**: Lobbying and interaction with legislators and regulators
- **OESA Staff**: Resources, connections, information, assistance
- **Global Relationships and Connectivity**: Access to global associations & government agencies

The OESA Supplier Network

www.oesa.org
Thank You

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