The Nation’s Leading Panel of Imaging Directors
Through dialog and collaboration, today’s top imaging administrators share their knowledge to shape the future of medical imaging technology and solutions.

Medical Imaging Confidence Index (MICI)

4th Quarter 2013 outlook (October – December)
2013 Year analysis

Created for AHRA- October 2013

Courtesy Of: THE MARKETECH GROUP

ahra the association for medical imaging management
MICI Index Overview

Why was MICI created?

- The MarkeTech Group and AHRA collaborated on the creation of MICI based on the belief that measuring the confidence of US medical imaging administrators on a regular basis would provide a valuable index for those having an interest in this industry.

- The MICI panel consists of a select group of imagePRO panel members from around the US representing different hospital sizes and geographic locations to capture a true "industry outlook": how imaging administrators see the future of medical imaging in regard to revenues, costs, purchasing, and growth.

- This exciting initiative captures the “mood” of imaging administrators on a quarterly basis regarding the state of medical imaging in the US. It also provides a unique statistical index that is likely to attract a lot of attention from those following this industry.

What is imagePRO and why is it important?

- imagePRO was created by The MarkeTech Group to provide a professional community for imaging administrators to participate in studies aimed at advancing the development of medical imaging technology.

- The imagePRO panel is a true community of industry professionals and is the leading opt-in panel of this industry. Members are subjected to strict enrollment requirements to represent the voice of their peers and to be part of a group of professionals whose knowledge and input is important.
137 imaging directors/managers of hospitals completed the 2-minute Web survey regarding their perception of medical imaging trends for the fourth quarter of 2013.

Scores measure the level of confidence, and range between 0 to 200. The score interpretation follows:
- Below 50 is extremely low confidence
- 50 to 69 is very low confidence
- 70 to 89 is low confidence
- 90 to 110 reflect an ambivalent score (Neutral)
- 111 to 130 is high confidence
- 131 to 150 is very high confidence
- Anything above 150 is extremely high confidence

Hospital bed size
- Under 100 beds: 45%
- 100 - 299 beds: 36%
- 300 or more beds: 19%
**Index Methodology**

**Results** are reflective of national trends because of the manner in which participants were invited to participate.

Â Participants were recruited by region and number of beds to reflect known AHA incidence.

Â Once the final counts were confirmed there was some statistical adjustment—weighting—to ensure the index reflects the US hospital imaging market. This type of adjustment is common when estimating overall market share, trends, and attitudes.

**Recruitment** accounts for about 90% of correct hospitals and regions to reflect the US hospital market.

Â While relatively minor in magnitude, the weighting accounts for the final 10% to refine the estimates and ensure they represent the US hospital market.

Â This refinement is necessary to create an index that truly represents how radiology departments view the economic outlook for the current quarter and will ensure that subsequent MICI results are valid.
### Medical Imaging Confidence Index (MICI)
**October to December 2013 results**

#### Fourth quarter 2013 results:

<table>
<thead>
<tr>
<th>Topic</th>
<th>Score Mean</th>
<th>Interpretation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Will grow monthly in diagnostic and interventional radiology</td>
<td>94</td>
<td>Neutral</td>
</tr>
<tr>
<td>Receive adequate reimbursement from Medicare for diagnostic and interventional imaging</td>
<td>62</td>
<td>Very low confidence</td>
</tr>
<tr>
<td>Internal operating and staff costs will remain constant</td>
<td>124</td>
<td>High confidence</td>
</tr>
<tr>
<td>Will have access to capital for imaging equipment and IT needs</td>
<td>75</td>
<td>Neutral</td>
</tr>
<tr>
<td>Will maintain/grow as a profit center</td>
<td>112</td>
<td>High confidence</td>
</tr>
<tr>
<td>Composite score across all areas</td>
<td>92</td>
<td>Neutral</td>
</tr>
</tbody>
</table>
Hospital bed size differences:
Hospitals with 100 or more beds have higher confidence in growth of diagnostic and interventional radiology than hospitals with fewer than 100 beds. Hospitals with less than 100 beds have lower confidence on having access to capital for imaging equipment and IT needs than hospitals with 100 or more beds.

<table>
<thead>
<tr>
<th>Topic</th>
<th>Score Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Under 100 beds</td>
</tr>
<tr>
<td><strong>Will grow monthly in diagnostic and interventional radiology</strong></td>
<td><strong>77</strong></td>
</tr>
<tr>
<td>Receive adequate reimbursement from Medicare for diagnostic and interventional imaging</td>
<td>56</td>
</tr>
<tr>
<td>Internal operating and staff costs will remain constant</td>
<td>127</td>
</tr>
<tr>
<td><strong>Will have access to capital for imaging equipment and IT needs</strong></td>
<td><strong>55</strong></td>
</tr>
<tr>
<td>Will maintain/grow as a profit center</td>
<td>103</td>
</tr>
<tr>
<td>Composite score across all areas</td>
<td><strong>81</strong></td>
</tr>
</tbody>
</table>
### Regional differences:
Imaging Directors in the West North Central region have higher confidence that internal operating and staff costs will remain constant than Imaging Directors in the South Atlantic region.

<table>
<thead>
<tr>
<th>Topic</th>
<th>Score Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Will grow monthly in diagnostic and interventional radiology</td>
<td>118 South Atlantic 86 South Atlantic 80 East North Central 100 West North Central 89 East South Central 99 West South Central 105 Mountain 92 Pacific</td>
</tr>
<tr>
<td>Receive adequate reimbursement from Medicare for diagnostic and interventional imaging</td>
<td>53 South Atlantic 56 South Atlantic 54 East North Central 71 West North Central 64 East South Central 77 West South Central 73 Mountain 56 Pacific</td>
</tr>
<tr>
<td><strong>Internal operating and staff costs will remain constant</strong></td>
<td><strong>101 South Atlantic 96 South Atlantic 131 East North Central 148 West North Central 137 East South Central 122 West South Central 125 Mountain 134 Pacific</strong></td>
</tr>
<tr>
<td>Will have access to capital for imaging equipment and IT needs</td>
<td>74 South Atlantic 67 South Atlantic 81 East North Central 81 West North Central 85 East South Central 80 West South Central 73 Mountain 64 Pacific</td>
</tr>
<tr>
<td>Will maintain/grow as a profit center</td>
<td>104 South Atlantic 102 South Atlantic 98 East North Central 121 West North Central 123 East South Central 110 West South Central 122 Mountain 125 Pacific</td>
</tr>
<tr>
<td><strong>Composite score across all areas</strong></td>
<td><strong>89 South Atlantic 80 South Atlantic 88 East North Central 102 West North Central 98 East South Central 96 West South Central 97 Mountain 92 Pacific</strong></td>
</tr>
</tbody>
</table>
Summary

- Hospitals with 100 or more beds have higher confidence in growth of diagnostic and interventional radiology than hospitals with fewer than 100 beds.

- Hospitals with less than 100 beds have lower confidence on having access to capital for imaging equipment and IT needs than hospitals with 100 or more beds.

- Imaging Directors in the West North Central region have higher confidence that internal operating and staff costs will remain constant than Imaging Directors in the South Atlantic region.
Results are now shown for Q4 2011 through Q4 2013

Comparisons are presented to show any trending of the data over a year period.

Analyses are based on between group analysis of variance (ANOVA) where participant’s scores are compared over time to determine if changes occur.
imagePRO members have lower confidence in the 4th quarter 2013 about having access to capital for imaging equipment and IT needs than the 3rd quarter 2013.

<table>
<thead>
<tr>
<th>Topic</th>
<th>Score Mean</th>
</tr>
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<tbody>
<tr>
<td></td>
<td>Q3 2013</td>
</tr>
<tr>
<td>Will grow monthly in diagnostic and interventional radiology</td>
<td>96</td>
</tr>
<tr>
<td>Receive adequate reimbursement from Medicare for diagnostic and interventional imaging</td>
<td>63</td>
</tr>
<tr>
<td>Internal operating and staff costs will remain constant</td>
<td>126</td>
</tr>
<tr>
<td><strong>Will have access to capital for imaging equipment and IT needs</strong></td>
<td><strong>87</strong></td>
</tr>
<tr>
<td>Will maintain/grow as a profit center</td>
<td>117</td>
</tr>
<tr>
<td><strong>Composite score across all areas</strong></td>
<td><strong>97</strong></td>
</tr>
</tbody>
</table>
Trending

Access to capital, growth as a profit center, and growth of diagnostic and interventional radiology have lower confidence the 4th quarter 2013 than the 1st semester 2012.

Margin of error: ±8 percentage points
For details on MICI scores by bed size – please click on underlined links, or go to Appendix B.
Summary

- Overall MICI scores for having access to capital for imaging equipment and IT needs in the 4th quarter 2013 are lower than the 3rd quarter 2013.

- Access to capital, growth as a profit center, and growth of diagnostic and interventional radiology have lower confidence the 4th quarter 2013 than the 1st Semester 2012.

- Growth of diagnostic and interventional radiology and access to capital have lower confidence the 4th quarter 2013 than the 1st semester 2012.
Medical Imaging Confidence Index (MICI)
October to December 2013
Study and report have been conducted and brought to you courtesy of:

THE MARKETECH GROUP

ahra
the association for medical imaging management
APPENDIX A - Questionnaire

Grow monthly in diagnostic and interventional imaging
Over the next three months, I am very optimistic that our department:

S1Q1. will grow monthly study volumes in Diagnostic imaging modalities (X-ray, Ultrasound, MRI, CT and NM).
S1Q2. will grow monthly study volumes in Interventional imaging modalities (biopsy, angio cath lab, etc.).

Receive adequate reimbursement from Medicare for diagnostic and interventional imaging
Over the next three months, I am very optimistic that our department:

S1Q3. will receive adequate reimbursement from Medicare for Diagnostic imaging studies.
S1Q4. will receive adequate reimbursement from Medicare for Interventional imaging procedures.

Internal operating and staff costs will remain constant
Over the next three months, I am very optimistic that the imaging department:

S2Q1. internal operating expenses (not including staff costs) will remain constant.
S2Q2. internal staff costs will remain constant.
APPENDIX A - Questionnaire

Will have access to capital for imaging equipment and IT needs
Over the next three months, I am very optimistic that our department:

S3Q1. will have access to capital/credit to fund investments in new imaging equipment and the costs associated with Imaging capital projects (e.g. siting & construction costs).

S3Q2. will have access to capital/credit to fund investments in areas outside of imaging equipment, such as PACS, RIS, or other imaging-related IT needs.

S3Q3. will have access to capital/credit to fund investment in imaging facility expansion, if desired.

Will grow as a profit center
Over the next three months, I am very optimistic that our department:

S4Q1. will continue to maintain/grow Diagnostic imaging services as a profit center.

S4Q2. will continue to maintain/grow Interventional imaging services as a profit center.
APPENDIX B

- Graphs are presented by number of beds to show MICI for all quarters and semesters.
- Interpretation is by number of beds—any changes across quarters are identified as being significant.
- If no changes are identified then differences that might appear are due to random fluctuation in responses over time and should not be considered real.
Appendix: October to December 2013 results

- Under 100 beds: Growth of diagnostic and interventional radiology and access to capital have lower confidence the 4th quarter 2013 than the 1st semester 2012.
100 to 299 beds: No changes in MICI between the 4th quarter 2013 and the 3rd quarter 2013.
300 or more beds: No changes in MICI between the 4th quarter 2013 and the 3rd quarter 2013.
Appendix: October to December 2013 results

Will grow monthly in diagnostic and interventional radiology: Hospital bed size

Back to Hospital bed size summary
Appendix: October to December 2013 results

Receive adequate reimbursement from Medicare for diagnostic and interventional imaging: Hospital bed size

Quarter/Semester

Back to Hospital bed size summary
Internal operating and staff costs will remain constant: Hospital bed size

Back to Hospital bed size summary
Appendix: October to December 2013 results

Back to Hospital bed size summary

Will have access to capital for imaging equipment and IT needs: Hospital bed size

- Under 100 beds
- 100 to 299 beds
- 300 or more beds
Back to Hospital
bed size summary

Quarter/Semester

Will maintain/grow as a profit center: Hospital bed size

- Under 100 beds
- 100 to 299 beds
- 300 or more beds

October 2013