## Business Case - Overview

<table>
<thead>
<tr>
<th>Objective</th>
<th>The Business Case for Global Data Standards in the Healthcare Supply Chain</th>
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<tbody>
<tr>
<td>Mission</td>
<td>Develop guidance for global healthcare for effective utilization and development of global standards with the primary focus on automatic identification to improve patient safety</td>
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<tr>
<td>Target Global Audience</td>
<td>Manufacturers, Distributors, Hospitals, Pharmacies, Regulatory Agencies, Trade Groups, Certification Bodies</td>
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<td>Implementation</td>
<td>Multiple Phases through a HUG partnership with global academic institutions lead by Michigan State University School of Packaging. Phase 1 scope and work plan is complete.</td>
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Since its beginning in 1952, the School of Packaging has conferred 5,400 BS and 200 MS degrees. Today there are 500 undergraduate, 60 graduate students and sixteen full time faculty members.

Yearly 200 students receive Bachelor Degrees, 15 Masters Degrees, 5 Ph.D’s

A strong Cooperative Education program exists linking with hundreds of companies in all industries that utilize packaging.

Bachelor of Science graduates are generalists in packaging with knowledge in broad range of materials, processes and design considerations with engineering skills applicable to a wide variety of industries.

Master’s of Science graduates are specialists with strong analytical and technical skills. They too, have a broad background in packaging but, with the addition of graduate level research, have developed an expertise and concentration in a specific area of packaging.
MSU Business Case Phase 2 Objectives

- Complete a rationale supporting the utilization of global automatic identification standards for the healthcare supply chain entitled, "The Business Case for Global Data Standards in the Healthcare Supply Chain".

- Objectives of the business case are:
  - Describe why standardization is desirable
  - Provide objective evidence that a global standard for the identification and tracking of healthcare products is in the best interest of patient safety
  - Is a sound business practice
  - Is in the best interest of the consuming public
  - Provide information to be used later for documents such as Regulatory and Legislative Staff Briefing Document, Refereed journal articles, Education and communication papers

- Information will be collected from GS1-HUG members, from the literature on the subject, from supply chain organizations, as well as from regulators and academic institutions around the world
MSU Proposed Resources

- School of Packaging
- Marketing and Supply Chain Management in the College of Business
- School of Criminal Justice in the College of Social Science
- Health Risk and Communication Group and the Advertising & Consumer Behavior Group in the College of Communication Arts and Sciences
- Michigan State University College of Law, Intellectual Property & Communication Law Program
- The National Food Safety & Toxicology Center in the College of Veterinary Medicine
- MSU Study Abroad
• Student literature researchers will be recruited and trained from the School of Packaging and five contributing departments
• Training will take about a week with one or two students from each department
• Students will be introduced to the purpose and the background of the project and will be trained in literature search methodology and use of pertinent data bases
• Students will be supplied with a starter set of key words and phrases to guide their search and will be supervised closely by collaborating faculty
• Literature search will be monitored to assure information is relevant to the business case, care will be taken to assure that both agreeing and opposing views are represented
• Literature search teams will meet twice weekly to report and share findings, modifying methods as needed
• Work will be guided by consultation with GS1-HUG Business Case Team and the Leadership Team
• Researchers will seek information from various stakeholders by direct contact using telephone, e-mail, or face-to-face interview
• Researchers will contact academic colleagues globally
Proposed Timeline for the GS1 HUG

- Literature/Data on Economic and Business Ramifications
- Literature/Data on Ramifications to public Health, to date
- Analysis of Data Collected by Gs1 and HUG
- Student Analysis
- Training

- 1 presentation
- 1 spreadsheet
- 1 paper

- Synthesis
- 1 presentation
- 1 spreadsheet
- 1 paper

- 4 presentations
- 4 spreadsheets
- 4 papers

Weeks: 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15
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<thead>
<tr>
<th>Role</th>
<th>Title</th>
<th>Expertise</th>
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<tbody>
<tr>
<td>Dr. Hugh Lockhart</td>
<td>Project Director</td>
<td>Professor Drug, Device Packaging, Regulatory Impacts</td>
</tr>
<tr>
<td>Dr. Robb Clark</td>
<td>Collaborator</td>
<td>Associate Professor Automatic Identification Systems, both printed codes and RFID</td>
</tr>
<tr>
<td>Dr. Laura Bix</td>
<td>Collaborator</td>
<td>Assistant Professor Healthcare, Consumer Interface, Drug, Device Regulatory Impacts</td>
</tr>
<tr>
<td>Dr. Diana Twede</td>
<td>Collaborator</td>
<td>Associate Professor Supply Chain, Logistics, Economics</td>
</tr>
<tr>
<td>Dr. Harold Hughes</td>
<td>Collaborator</td>
<td>Professor Computer Management Systems</td>
</tr>
<tr>
<td>John Spink</td>
<td>Project Manager</td>
<td>PhD Candidate Anti-counterfeit systems, Project Management, Business Management</td>
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• Deliverables are:
  • Position paper of 100 - 150 pages
  • Power Point Executive Summary of about 10 pages
  • Power Point conference presentation of about 25 pages
• Planned to be a fifteen week effort, at a cost of $118,050
• $5,000 of the above cost has already been funded to deliver Phase 1
• Other Deliverables:
  • Research done by MSU faculty will influence direction of instruction of future students
  • Curriculum changes are possible due to knowledge gained during development
  • Students will be better prepared for the global environment in Auto ID
  • Will create a center of excellence at MSU for new areas of study
MSU Business Case Next Steps

• Secure funding for Business Case - $113M
  • One third of the total, $40,000, would provide the report on the first stage, Analysis of GS1 and HUG Data, as well as initiate the student analysis.
  • A second payment, of $50,000 will provide the 2nd stage report on Literature and Data on Ramifications to Public Health.
  • The final payment of $23,000 will cover the final report on Economic and Business Ramifications, the position paper, executive summary and conference presentation as described in the proposal.
  • Recruiting students can begin as soon as we have a contract and payment of an initial $20,000. There are always students around, and the faculty are on call to participate.