

Manufacturability Assessment Knowledge-Based Evaluation



ABOUT MAKE

The purpose of the **MAKE** is to assess the manufacturability of a product by evaluating the impact of the design against key aspects of manufacturing. This methodology will identify the product risks at different phases of the product life cycle. Identifying these risks early in the design cycle is critical to improving the overall cost, design, and manufacturability of the product.



BEST PRACTICES

MAKE will evaluate a product design against industry best practices for manufacturing processes. Integrating best practices into the product will help reduce costs.



EXPERT EVALUATION

Assessment of the product is done by subject matter experts with years of experience in multiple areas of manufacturing, providing valuable insight on manufacturability risk reduction.

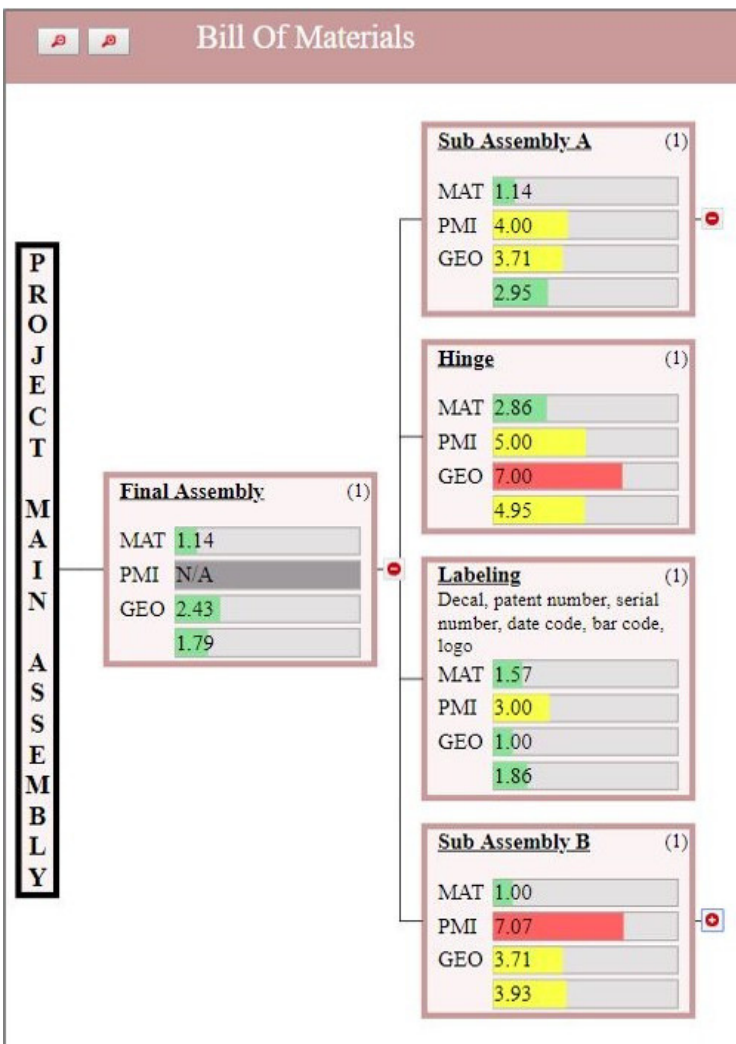


PAYOFFS

Our team will improve your understanding of the manufacturability of proposed variants of a system and the trade offs that can be made to achieve optimal results.

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An evaluation of the design occurs on the key elements of manufacturability.

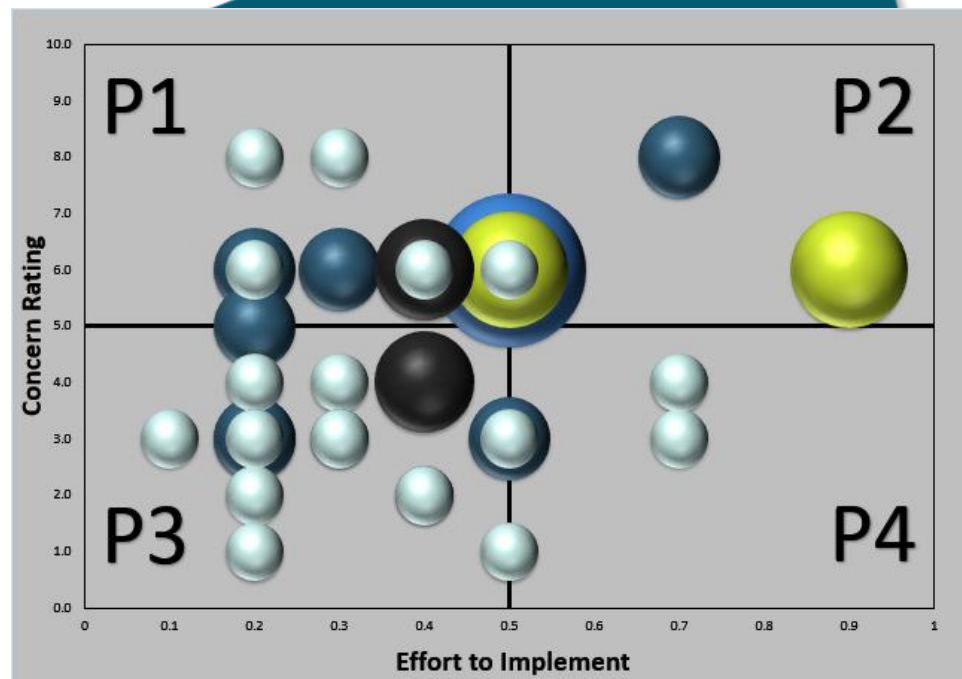
A diagnosis will highlight core problematic areas of the design that need to be improved.

Evaluation

Diagnosis

Prescription

Based on the diagnosis, prescriptive measures that will result in improvement of the design's manufacturability are recommended.



Case Studies for Improving Product Manufacturability using **MAKE**

USING MAKE

Scenario

A small company on the verge of entering low-rate initial production (LRIP) on a military product. Internal desire to expand the market for their product by developing a commercial variant.

Challenge

The product is very expensive to manufacture and is comprised of many specialized parts. Most of the manufacturing and assembly is done in house with limited ability to increase production.

Benefits

By participating in the case study, the customer received multiple benefits:

- Identification of design features that have the potential to impact manufacturability cost or increase risk while providing little to no benefit
- Specific recommendations to address concern areas
- Concern vs. effort analysis for customer prioritization of recommendations

Results

After performing the assessment, 228 concerns were identified with 268 recommendations. The customer planned to implement 53% of the recommendations immediately and 24% on a future product revision.