MedInsight
Guideline Analytics

MedInsight® Guideline Analytics is a data organization and analysis tool designed to identify inefficiencies in the way care is delivered at a population level. Developed with the same evidence-based guidelines that promote effective care at the individual level, the MedInsight Guideline Analytics tool enables organizations to easily aggregate claim data to help improve performance and care within a given population. Guideline Analytics is the ideal analytic resource for retrospective and concurrent care management review as well as a means to audit and evaluate auto authorization work-flows.

The MedInsight Guideline Analytics tool is unique in that it organizes medical procedural and disease condition groupings in the same way a clinician thinks and works with members. Based on the MCG (formerly Milliman Care Guidelines) evidence-based guidelines that promote effective care at the individual level, the MedInsight Guideline Analytics tool enables organizations to aggregate and leverage claim data to help improve performance and care within a given population. This analytical methodology is not driven by reimbursement practices or resource use of the healthcare system. Rather, the output from this powerful tool was designed for daily clinical use, making Guideline Analytics part of your foundation for faster organizational change and near real-time monitoring of progress.

The Unique Value of Guideline Analytics

MedInsight Guideline Analytics is a standalone software application that measures variance between your experience and guideline protocols, as well as benchmarks against similar organizations.

This population health tool provides a set of crucial data analytics for provider profiling, care management dashboard reporting, and marketing the value of one's medical management initiatives.

The MedInsight Guideline Analytics tool also offers the following advantages:

- Our care guideline categories are more clinically homogeneous and specific than other categorization schemes (such as DRGs) and correspond to specific clinical guidance, therefore providing results that are clinically interpretable and actionable.
- Benchmark data allow clients to assess areas of clinical strength and weakness relative to peer organizations, helping focus quality improvement efforts and providing a baseline to track progress.
- Benchmarks have been developed for:
  - Milliman's loosely and well-managed range of degree of medical management benchmarks
  - Length of stay benchmarks (Leveraging MCG's goal length of stay attainment logic)
  - Re-admission rate benchmarks for more than 280 medical and surgical procedures (highlighting metrics such as excessive ER admits)
  - Seventy-nine potentially ambulatory procedural benchmarks
  - ER and observation care utilization benchmarks for all 280 procedures
  - Inpatient benchmarks including Rehab and SNF analysis: measuring days/1,000, admits/1,000, and % usage rate separately for ICU, CCU, and intermediate care

How Medinsight Guideline Analytics Works

Your data is grouped using algorithms developed by Milliman and MCG since 1997. The MedInsight Guideline Analytics tool uses standard claim data elements, including diagnosis/procedure codes and patient demographics, to assign each inpatient admission to a category. Each admission is categorized by a principal guideline code, subsidiary codes, and a severity category based on the comorbidity methodology developed by the Centers for Medicare and Medicaid Services for its DRG system. Key metrics are produced for evaluating population admission rates, including re-admission rates per guideline. The hospital stay analysis metrics include goal length of stay attainment rates, ICU/CCU usage, and ICU/CCU days/1,000. Unlike any other tool on the market, inpatient and ambulatory care is broken down by guideline category to illuminate ambulatory surgical opportunities. Emergency department utilization and cost, as well as observation care rates, are presented by guideline category to round out the full spectrum of hospital intake analysis.

The grouping module is updated annually to reflect the most current content, including the latest HCPCS and AMA CPT-4 procedure codes, as well as any updates or additions to the ICD-9 and ICD-10 diagnosis and procedure coding system.

Figure 1 below demonstrates how one organization compares to national averages for ambulatory care utilization, inpatient utilization, and outpatient utilization. The goal length of stay (GLOS) provides a target for an organization, reflecting the optimal length of stay for patient recovery.

About Medinsight Data Warehouse Tools

Guideline Analytics is part of the MedInsight Tools portfolio, a suite of standalone analytic products developed and offered by the MedInsight team at Milliman. In working with our clients–health plans, at-risk providers/ACOs, employers, state governments, third-party administrators, and community health coalitions–we are keenly aware of the different business demands of each. Because one size does not fit all, Milliman has made the MedInsight Tools available for purchase outside the MedInsight Analytic Platform. These tools enable each client to customize their MedInsight experience by licensing only what they need.

FIGURE 1: INPATIENT VS OUTPATIENT OPTIMAL SITE OF CARE ANALYSIS

GUIDELINE TITLE	GOAL LOS	TOTAL PROCEDURES	TOTAL AMBULATORY	% AMBULATORY	NATIONAL AMBULATORY %	HIGH QUINTILE AMBULATORY %
Angioplasty, Percutaneous Coronary intervention	Ambulatory	17	6	35.3%	34.8%	52.1%
Electrophysiologic Study and Implantable Cardioverter-Defibrillator (ICD) Insertion, Transvenous	Ambulatory or 1 Day	3	1	33.3%	45.2%	55.5%
Electrophysiologic Study and Intracardiac Catheter Ablation	Ambulatory	3	1	33.3%	64.7%	78.0%
Appendectomy, without Peritonitis	Ambulatory or 1 Day	9	1	11%	21.2%	38.6%
Appendectomy, without Peritonitis, by Laparoscopy	Ambulatory or 1 Day	27	2	7.4%	46.3%	68.8%
Cholecystectomy by Laparoscopy	Ambulatory	53	35	66.0%	78.0%	85.7%
Cholecystectomy with Common Duct Exploration by Laparoscopy	Ambulatory or 1 Day	1	1	100%	54.2%	50.6%
Esophageal Diverticulectomy, Endoscopic Stapling	Ambulatory or 1 Day	–	–	–	62.9%	100.0%
Fundoplasty, Esophagogastric, by Laparoscopy	Ambulatory	3	0	0.0%	53.5%	76.6%
Gastric Restrictive Procedure without Gastric Bypass by Laparoscopy	Ambulatory	7	0	0.0%	9.2%	25.1%
Mastectomy, Complete	Ambulatory	7	4	57.1%	52.0%	69.9%
Mastectomy, Complete, with insertion of Breast Prosthesis or Tissue Expander	Ambulatory or 1 Day	1	0	0.0%	42.5%	64.0%
Mastectomy, Partial (Lumpectomy)	Ambulatory	22	22	100%	94.8%	98.0%