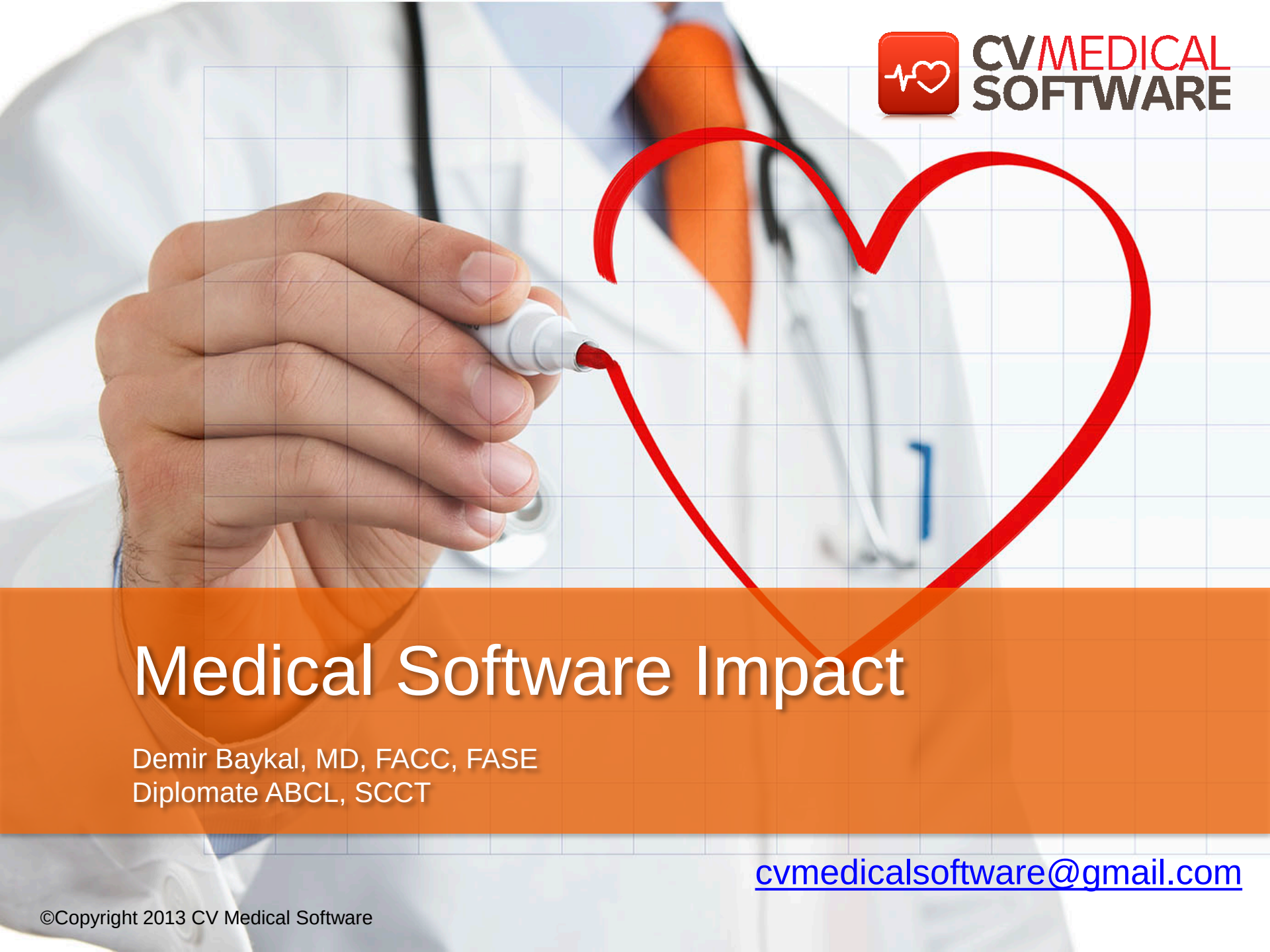

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# Medical Software Impact

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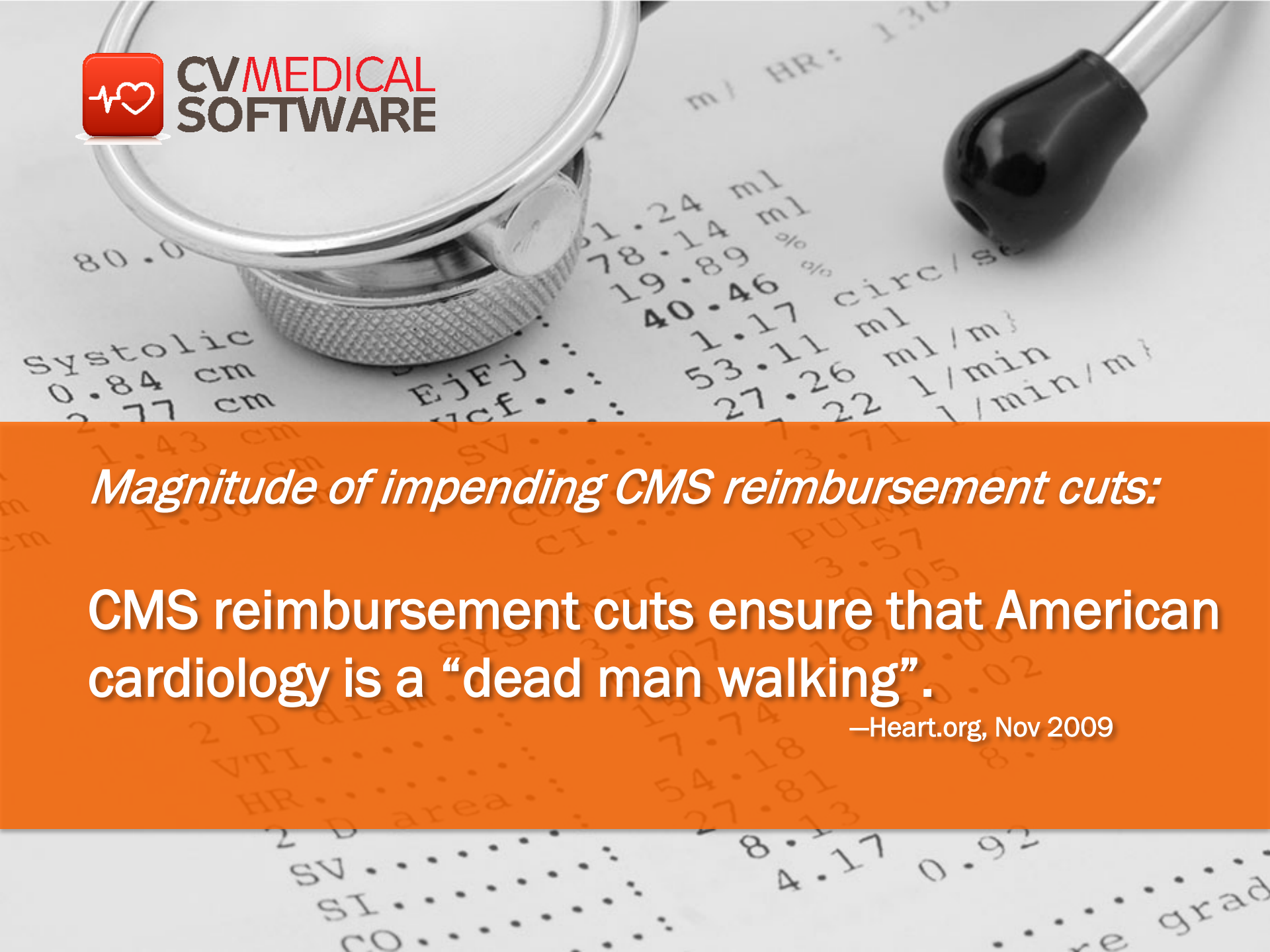


*Magnitude of impending CMS reimbursement cuts:*

CMS reimbursement cuts ensure that American cardiology is a “dead man walking”.

—Heart.org, Nov 2009

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*Hospitals are bracing themselves for significant reimbursement changes under health reform.*

"Our biggest challenge over the next one to three years will be cuts from Medicare and more pay-for-performance issues that could impact us financially."

—President and CEO Chris Karam,
Christus St. Michael Health System, Texas

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*Three reimbursement changes for hospital performance:*

- Value-based purchasing (VBP)—October 2012
- Readmissions—October 1, 2012 (FY 2013)

*Under the Affordable Care Act provision hospitals will face penalties for excess admissions for heart attack, heart failure and pneumonia, starting in October.*

- Acquired conditions—(FY 2015)

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# Hospitals underestimate the threat of HCAHPS* penalties.

*Hospital Consumer Assessment of Healthcare Providers and Systems

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- Despite the looming threat of reduced reimbursements under performance measures, hospitals may be overly optimistic that they will perform well

- In fact, they should probably be shaking in their boots, considering that the Hospital Consumer Assessment of Healthcare Providers and Systems (HCAHPS) scores and other core measures in value-based purchasing will affect their payments

- Hospitals will not only get paid for high performance compared to national benchmarks with other hospitals across the country but also for dramatic improvement against themselves

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Although daunting, the solution to value-based purchasing is:

- increased use and adherence to protocols
- real-time monitoring and feedback
- accurate coding at the outset, *and*
- better training for doctors and nurses on patient communication techniques

# Solutions

- In the lieu of ever-expanding medical literature and bureaucracy, it is unrealistic to expect physician performance itself to handle the challenges.

- In the era of cost containment, it is also unlikely that hiring additional support staff (nurses, care coordinators, etc.) will be effective

- *Efficacious utilization of clinical support systems may provide a viable solution to the challenges ahead*

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# Limitations of Current Support Systems

- Disease-specific or oriented
- Pathway architecture
- Designed for populations, rather than individuals, of bio systems with vast inter-individual variation
- Lack self quality-control, feedback systems
- Not interactive
- Lack flexibility to accommodate variations intrinsic to human biology and judgmental component of delivering healthcare

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# Ideal Clinical Decision Support System

- Contains artificial intelligence, search engine tools
- Structured for evidence-based outputs for individuals, rather than populations
- Interactive
- Already utilized in clinical practice with proven outcomes benefit
- Available as a stand alone web-based system or as an app

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# Benefits of an Ideal Clinical/Hospital Support System

- Accurate diagnostic coding and documentation on admission and throughout the hospital stay. Example (CHF acute status Day 1, critical status Day 2), ***a mandatory step for reimbursement***

- Meeting the appropriate criteria of planned procedures via proper documentation, ***another mandatory step for reimbursement***

- Implementation of evidence-based strategies early on to meet the core quality measures

- Reduced chronic disease readmissions (CHF) to **prevent cuts in hospital DRG**

- To provide a source for healthcare providers for any cardiovascular disease management questions with instant link to medical literature

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CVD Evaluator is clinical support software with artificial intelligence capability, patented by the United States Patent Office for its methodology.

CVD evaluator

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# www.cvmedicalsoftware.com

- Once the *input* consisting of a relevant individual clinical data is entered, the system *outputs* specific recommendations such as certain drugs, device therapies, diagnostic tests, ***appropriate diagnostic coding,*** and ***appropriateness level*** for any procedure

- The system factors in cardiovascular disease **CMS guidelines**, risk scoring systems, all published guidelines, clinical trials data and other credible literature.

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- The diagnostic and therapeutic recommendations are based on guidelines and clinical trials cited in the reference section of the output which can be instantly linked.

- The system is designed such that any newly-released literature can be added instantly to keep it up to date.

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The better outcomes from the utilization of the system  has been presented and published in:

- American College of Cardiology
- HDL Summit
- National Lipid Association
- North American Society of Imaging
- The Journal of Clinical Lipidology
- The Journal of American College of Cardiology
- Heart Rhythm Society

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# What Is Potentially Next for Hospitals

- The target to curb Medicare isn't all that surprising with an expected 40 percent of healthcare spending attributed to hospital care in 2020

- While Medicare and Medicaid make up 24 percent of the 2011 federal budget, the Congressional Budget Office estimates they will soak up 30 percent of the 2021 budget

- Couple the reduced reimbursements with increased Medicaid enrollees of an additional 20.4 million over the next decade, and match that with fewer disproportionate hospital share (DSH) payments and productivity adjustments, 15 percent more institutional providers will go bankrupt by 2019

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It is therefore imperative that each institution strictly adhere to the practice of evidence-based medicine and proper documentation, a task that can only be achieved via intelligent support systems.

*Intelligent Cardiovascular Medical Software*

CVD evaluator