

High Definition Visualization & Equipment Management System supports advanced G.I. endoscopy procedures in a community-based hospital outpatient setting.

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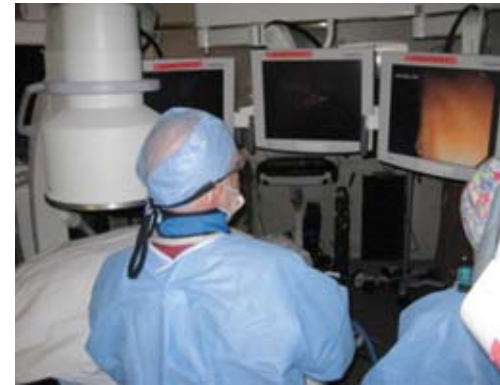
About Community Hospital of the Monterey Peninsula

Community Hospital of the Monterey Peninsula, founded in 1934 and located at 23625 Holman Highway in Monterey, is a nonprofit healthcare provider with 205 staffed acute-care hospital beds and 28 skilled-nursing beds, delivering a continuum of care from birth to end of life, and every stage in between. It serves the Monterey Peninsula and surrounding communities through 15 locations, including the main hospital, outpatient facilities, satellite laboratories, a mental health clinic, a short-term skilled nursing facility, Hospice of the Central Coast, and business offices. Find more information about Community Hospital of the Monterey Peninsula at www.chomp.org

Procedures and Application: Surgeon Perspective

Dr. James A. DiSario frequently performs complex G.I. procedures in rooms equipped with the NuBOOM Visualization & Equipment Management System located in the Outpatient Surgery Department of Community Hospital of the Monterey Peninsula. The types of GI procedures performed at the Community Hospital include those that necessitate fluoroscopy, require general anesthesia, have an anticipated long case duration or are based on individual patient risk assessment factors. Examples of these procedures include placement of esophageal stents, percutaneous endoscopic jejunostomies, pancreatic procedures, enteroscopies, and all ERCP's (endoscopic retrograde cholangiopancreatography) for stones or malignant obstructive disorders.

For High Definition (HD) GI system visualization and advanced therapy, Dr. DiSario utilizes a range of High Definition GI endoscopes manufactured by Olympus Corporation, as well as the new "scope-within-a-scope" SpyGlass™ Direct Visualization System from Boston Scientific for direct visualization, diagnostic testing and therapeutic intervention associated with the bile ducts and pancreas. Community Hospital of the Monterey Peninsula was one of the first community-based hospitals in the U.S. to support this new technology for its patient population that speeds diagnosis and definitive treatment of challenging GI conditions, such as endoscopic removal of stones in smaller or narrowed biliary ducts via electrohydraulic or directed laser energy.



Community Hospital of the Monterey Peninsula NuBOOM System Story

Community Hospital of the Monterey Peninsula Outpatient Surgery Center, built in 1988, serves a wide variety of procedural needs. Medical and surgical specialties supported in the Community Hospital's four outpatient operating rooms include orthopedics, gastroenterology, general and laparoscopic surgery, urology, gynecology, and plastic and reconstructive surgery.

Mariano Catbagan, RN, Director of the Outpatient Surgery Department, with a multi-departmental technology selection committee, purchased two NuBOOM Visualization & Equipment Management Systems [CompView Medical, Beaverton, OR] after review of available alternatives to upgrade the OR infrastructure to address increased minimally invasive surgery demand at the Center.

The NuBOOM System was selected as the digital O.R. solution of choice for the Outpatient Surgery Department based on capital cost savings and the

2-day installation benefit of minimizing OR downtime. A high room utilization rate (over 75%), the desire to improve visualization ergonomics and reduce safety hazards (by removing floor cables and video cart clutter) were also factors contributing to the purchase decision.

Two of the four operating rooms, each approximately 324 sq. ft, were outfitted with 4-monitor NuBOOM Systems in 2007 as the first budgeted project phase. NuBOOM video integration and control components were upgraded a year later to support high definition visualization following the purchase of a new ConMed Linvatec® HD video camera system for laparoscopic cholecystectomy and bariatric surgical procedures, as well as HD endoscopes from Olympus Corporation.

As stated by Mariano Catbagan, "the NuBOOM Systems have worked out very nicely and we have been extremely pleased with CompView Medical's service and support. In each NuBOOM room, the clutter on the floor has been removed and there is no longer any need to move heavy equipment carts around."

Sigrid Mattheis, RN, Assistant Director of Community Hospital Outpatient Surgery Department, remarked that the important post-installation benefits of the NuBOOM System include:

- Saving staff from pulling or pushing heavy or awkward equipment carts
- Removing power cords from the floor
- Reduced room clutter with centralized medical equipment storage space
- Improved surgical team physical viewing ergonomics
- High Definition visualization image quality



NuBOOM System, including video integration routing and control components

System Integration: High Definition

The NuBOOM System's video integration engine - the DOCS® Digital Operating Control System - displays and routes all G.I. endoscopic and fluoroscopic images, in addition to PACS, patient monitoring and other source inputs around the procedural field to any or all of the NuBOOM System's four High Definition monitors. Dr. DiSario favors his customized "in the round" surgical viewing orientation, possible only with the NuBOOM's highly maneuverable boom arm segments.

"From the flexibility to the ergonomic aspects, the NuBOOM has been the best choice. The surgeons really like the multiplicity of the ancillary displays with the ability to view the surgical images. Turn-overs are noticeably faster and transitions have become much more convenient."

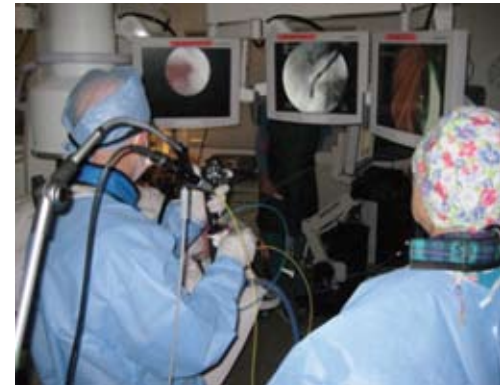
*Mariano Catbagan,
RN, MHA, CNOR*

"High Definition viewing is obviously very relevant to what we are doing in gastroenterology, both now and in the future," remarks Dr. DiSario. "The new HD endoscopes plus the NuBOOM System's HD monitors are critical to see the fine details for diagnosis and therapy. If needed, we use color filters built into the newer endoscopes to better view and diagnose potential malignancies. New single and double balloon enteroscopes have, for the first time, made the small bowel accessible via the endoscopic route. High Definition viewing in a physically more ergonomic environment such as that offered by the NuBOOM System, are important aspects of this scenario. I am able to see all the images right in front of me."

The Future of Gastroenterology: NOTES – New Gateways to Advanced Minimally Invasive Surgical Techniques

Dr. DiSario sees the continued evolution of G.I. endoscopic platforms and visualization systems to support the emergence of Natural Orifice Transluminal Endoscopic Surgery (NOTES). He believes NOTES procedures will support close collaboration between the specialties of General Surgery/MIS and Gastroenterology that will reflect the respective strengths of each discipline.

High Definition visualization, upgradable open architecture video integration systems, advanced physical ergonomics and efficient cost-effective infrastructure solutions currently in use by Dr. DiSario and his colleagues at Community Hospital of the Monterey Peninsula will continue to be important contributors to optimized environments for advanced minimally invasive patient diagnosis and therapy.



Dr. DiSario and his "in the round" surgical viewing orientation

About the Authors

James A. DiSario, MD

Dr. DiSario is a gastroenterologist with Monterey Bay GI Consultants in Monterey, California where he provides consultative and procedural services, including advanced therapeutic endoscopy (minimally invasive therapy) for a variety of digestive disorders. He divides his time between the Monterey Bay Endoscopy Center and Community Hospital of the Monterey Peninsula. Dr. DiSario is an internationally recognized expert and described as “having an absolute passion for patient care, and driving cutting edge research and clinical advancements in gastroenterology”.

Dr. DiSario joined Monterey Bay GI Consultants in 2006. He moved from a full time position as Professor of Medicine at the University of Utah, School of Medicine after 16 years of service and maintains an appointment as Adjunct Professor of Medicine. He is a graduate of Georgetown University School of Medicine and residency program in Internal Medicine. He completed a fellowship in Gastroenterology at the University of Arizona and received further training in advanced therapeutic pancreatic and biliary endoscopy at the University of Amsterdam in the Netherlands. In addition to his clinical expertise, Dr DiSario has experience as a National Institutes of Health and National Cancer Institute researcher, has authored numerous publications including original medical research, review papers and textbook chapters, and lectures nationally and internationally. He is certified by the American Board of Internal Medicine in Internal Medicine and Gastroenterology, and listed with “Best Doctors in America”.

Mariano Catbagan, RN, MHA, CNOR

Mariano Catbagan, RN, MHA, CNOR, Director Outpatient Surgery Center for Community Hospital of the Monterey Peninsula, has over 30 years of experience as a Director, Charge Nurse and Nurse Manager. Mariano has developed and implemented various programs including Par Excellence inventory control systems, RN First Assistant Program and is responsible for budget planning, capital equipment procurement, education and administration. He holds an undergraduate Psychology degree from Fresno State College, Nursing Associates degree from Fresno City College and a Masters of Healthcare Administration from Golden Gate University.

About Monterey Bay G.I. Consultants, Inc.

Monterey Bay G.I. Consultants, Inc. is a group of nine gastroenterologists in private office practice in Monterey, California, as well as at The Monterey Bay Endoscopy Center. The practice, founded in 1978, addresses all problems and disorders of the adult G.I. system and serves a diverse, adult patient population spanning across all of Monterey County. The physicians perform approximately 8500 procedures per year, including, but not limited to colonoscopy, esophagogastroduodenoscopy (EGD) and endoscopic retrograde cholangiopancreatography (ERCP).

