**Case Study**

**A Trusted Resource in the EHR**

UpToDate evidence-based clinical decision support in the clinical workflow: Seoul National University and Bundang Hospitals

---

**ABOUT SEOUL NATIONAL UNIVERSITY HOSPITAL**

Seoul National University Hospital (SNUH) was established in 1885 as Korea’s first national hospital, and since then has worked to advance medicine in Korea. It is the affiliate hospital for Seoul National University College of Medicine and is comprised of the Main Hospital, Children’s Hospital, Cancer Hospital, and the Biomedical Research Institute. Approximately 2,000 inpatients and 8,000 outpatients are treated each day by 500 medical professionals and 5,800 staff.

---

**DOCTORS FROM SNUH TRUST UPTODATE TO FIND EVIDENCE-BASED ANSWERS TO THEIR QUESTIONS**

SNUH has had an institution-wide subscription to UpToDate since 2007; and UpToDate is well used and highly regarded by doctors within the hospital as a trusted source for evidence-based clinical decision support.

SNUH’s decision to subscribe to UpToDate has resulted in rapid adoption, very high usage levels, and the highest praise from clinicians. A survey of clinical staff has shown that all doctors agree or strongly agree that UpToDate helps them answer clinical questions, saves time, and is a good resource for practicing evidence-based medicine. Over 64% of clinicians surveyed said they use UpToDate in their clinical practice on a daily basis.

---

“Having UpToDate is of great value for SNUH. Our clinicians have really embraced it — to the benefit of our patients.”

— Joong Shin Park, MD, PhD
Professor, Department of Obstetrics and Gynecology
Seoul National University Hospital
Seoul National University College of Medicine
Seoul, South Korea
CASE STUDY
SEOUL NATIONAL UNIVERSITY AND BUNDANG HOSPITALS

“SNUBH doctors and nurses can access UpToDate directly from their EHR system, making it very easy to access evidence-based medicine,” explained Soo Young Yoo, PhD, Center for Medical Informatics at SNUBH.

EXCELLENT USER ACCEPTANCE OF UPTODATE WITHIN THE HOSPITAL INFORMATION SYSTEM

SNUBH continues to improve its IT infrastructure to benefit clinicians and improve patient care. When SNUBH migrated to its next generation EHR system, ezCaretech BestCare version 2, they wanted to include access to clinical decision support within the clinical workflow. SNUBH collaborated with the UpToDate technical support team to embed links to UpToDate into numerous points in the EHR. Working closely, they were able to achieve integration within a few weeks. The SNUBH team then promoted usage through a variety of methods leading to widespread adoption.

“SNUBH doctors and nurses can access UpToDate directly from their EHR system, making it very easy to access evidence-based medicine,” explained Soo Young Yoo, PhD, Center for Medical Informatics at SNUBH.

SEUL NATIONAL UNIVERSITY BUNDANG HOSPITAL

Seoul National University Bundang Hospital (SNUBH) adopted UpToDate in 2013 through its cooperative relationship with Seoul National University Hospital. SNUBH is Korea’s first specialized hospital for research and treatment of Korea’s aging population, with 8 centers and 34 departments focused on adult and elderly diseases. SNUBH also offers the highest level of general treatment and emergency services for local residents.

SNUBH was the first advanced technology digital hospital of the 21st century in Korea, providing an Electronic Hospital Record (EHR) system for its medical staff. SNUBH achieved the first HIMSS Analytics Stage 7 Award outside of North America in recognition of their successful deployment and adoption of IT within the hospital. The hallmarks of Stage 7 achievement include a paperless environment, comprehensive health information exchange, and data warehousing for population health improvement.

EXCELLENT USER ACCEPTANCE OF UPTODEATE WITHIN THE HOSPITAL INFORMATION SYSTEM

SNUBH continues to improve its IT infrastructure to benefit clinicians and improve patient care. When SNUBH migrated to its next generation EHR system, ezCaretech BestCare version 2, they wanted to include access to clinical decision support within the clinical workflow. SNUBH collaborated with the UpToDate technical support team to embed links to UpToDate into numerous points in the EHR. Working closely, they were able to achieve integration within a few weeks. The SNUBH team then promoted usage through a variety of methods leading to widespread adoption.

“SNUBH doctors and nurses can access UpToDate directly from their EHR system, making it very easy to access evidence-based medicine,” explained Soo Young Yoo, PhD, Center for Medical Informatics at SNUBH.

SEUL NATIONAL UNIVERSITY BUNDANG HOSPITAL

Seoul National University Bundang Hospital (SNUBH) adopted UpToDate in 2013 through its cooperative relationship with Seoul National University Hospital. SNUBH is Korea’s first specialized hospital for research and treatment of Korea’s aging population, with 8 centers and 34 departments focused on adult and elderly diseases. SNUBH also offers the highest level of general treatment and emergency services for local residents.

SNUBH was the first advanced technology digital hospital of the 21st century in Korea, providing an Electronic Hospital Record (EHR) system for its medical staff. SNUBH achieved the first HIMSS Analytics Stage 7 Award outside of North America in recognition of their successful deployment and adoption of IT within the hospital. The hallmarks of Stage 7 achievement include a paperless environment, comprehensive health information exchange, and data warehousing for population health improvement.

EXCELLENT USER ACCEPTANCE OF UPTODEATE WITHIN THE HOSPITAL INFORMATION SYSTEM

SNUBH continues to improve its IT infrastructure to benefit clinicians and improve patient care. When SNUBH migrated to its next generation EHR system, ezCaretech BestCare version 2, they wanted to include access to clinical decision support within the clinical workflow. SNUBH collaborated with the UpToDate technical support team to embed links to UpToDate into numerous points in the EHR. Working closely, they were able to achieve integration within a few weeks. The SNUBH team then promoted usage through a variety of methods leading to widespread adoption.

“SNUBH doctors and nurses can access UpToDate directly from their EHR system, making it very easy to access evidence-based medicine,” explained Soo Young Yoo, PhD, Center for Medical Informatics at SNUBH.

SNUBH was the first advanced technology digital hospital of the 21st century in Korea, providing an Electronic Hospital Record (EHR) system for its medical staff. SNUBH achieved the first HIMSS Analytics Stage 7 Award outside of North America in recognition of their successful deployment and adoption of IT within the hospital. The hallmarks of Stage 7 achievement include a paperless environment, comprehensive health information exchange, and data warehousing for population health improvement.

EXCELLENT USER ACCEPTANCE OF UPTODEATE WITHIN THE HOSPITAL INFORMATION SYSTEM

SNUBH continues to improve its IT infrastructure to benefit clinicians and improve patient care. When SNUBH migrated to its next generation EHR system, ezCaretech BestCare version 2, they wanted to include access to clinical decision support within the clinical workflow. SNUBH collaborated with the UpToDate technical support team to embed links to UpToDate into numerous points in the EHR. Working closely, they were able to achieve integration within a few weeks. The SNUBH team then promoted usage through a variety of methods leading to widespread adoption.

“SNUBH doctors and nurses can access UpToDate directly from their EHR system, making it very easy to access evidence-based medicine,” explained Soo Young Yoo, PhD, Center for Medical Informatics at SNUBH.
UpToDate can be accessed both from the physician and nursing main menu pages and from an icon in the radiology lab report, medications page, and problem list. “Our mission is to provide our clinicians with technology enabling them to provide the best possible patient care, and UpToDate is a trusted partner in that effort.”

**IMPACTING PATIENT CARE**

“UpToDate has definitely changed the way physicians are treating patients,” said Dr. Hee Hwang, CIO, Associate Professor, Department of Pediatrics at SNUBH. “I encourage my residents and fellows to use UpToDate on a regular basis and it has really satisfied their need for clinical guidelines. Nurses are also active users, consulting UpToDate for advanced knowledge regarding drugs, tests, and diseases. Access to clinical decision support by the nursing staff is one of the wonderful benefits of having UpToDate available throughout the hospital,” added Dr. Hwang. “Physician assistants and pharmacists are also big fans of UpToDate. We have a closed loop medication administration system to reduce errors, and use UpToDate to look up specifics of a drug and to check dosing. Nurses and residents can review the risks to improve patient safety.”

“Embedding UpToDate into our EHR has been very successful,” continued Dr. Hwang. “I am confident that other hospitals that use UpToDate can improve the quality of care offered to patients and increase UpToDate usage by providing their clinicians access to UpToDate evidence-based clinical decision support within the EHR.”

**ABOUT UPTODATE**

UpToDate, part of Wolters Kluwer Health, is an evidence-based, physician-authored clinical decision support resource which more than 850,000 clinicians in 164 countries trust to make the right point-of-care decisions. The more than 5,700 world-renowned UpToDate physician authors, editors, and peer reviewers utilize a rigorous editorial process to synthesize the most recent medical information into trusted, evidence-based UpToDate recommendations, proven to improve patient care and quality. More than 30 research studies confirm the widespread usage of UpToDate and its association with improved patient care and hospital performance — including reduced length of stay, fewer adverse complications, and lower mortality.1
