Transcultural Perioperative Nursing in Berlin

ABSTRACT

Political events and military base closures in the early 1990s caused the US Army Hospital, Berlin, to extend care to include British military forces and to contract the services of civilian German surgeons and nurses. This article describes transcultural perioperative nursing in Berlin from 1991 to 1994. It also compares the differences between American, British, and German military and civilian expectations of OR nurses, anesthesia care providers, and surgeons and explores nursing education, licensing, practice issues, and socialized medicine in a transcultural environment. *AORN J* 63 (March 1996) 533-544.

Berlin is the official capital of unified Germany, although Bonn, which is the capital of former West Germany, remains the provisional seat of government. Berlin was a symbol of the cold war (ie, tensions between the Soviet Union and the Western Allies). For more than 40 years, Berlin was a divided city as a result of the post-World War II (WWII) Potsdam Conference, which divided the city physically (ie, the United States, France, and Great Britain controlled West Berlin, and the former Soviet Union controlled East Berlin), politically, and ideologically. In 1948, the Soviets closed all roads and blocked all railroad and barge traffic going in and out of Berlin in an effort to force the citizens of West Berlin to accept incorporation into the Soviet zone. The Western powers, however, successfully overcame the blockade by mounting the Berlin airlift, which furnished the western sectors of Berlin with food, fuel, and other vital supplies.

In August 1961, East Germany began erecting the Berlin Wall between East and West Berlin to prevent individuals from defecting from East Berlin (Figure 1). When completed, the heavily fortified Berlin Wall was 13 feet high and 100 miles long, and it completely isolated the city of Berlin for 28 years.

US ARMY HOSPITAL, BERLIN

The US Army Hospital, Berlin (USAHB) (Figure 2), is a hybrid of German and American design, to which both German and American building safety codes were applied. More than 13 years elapsed from the initial proposal for construction until the time the hospital actually opened in October 1976. When we were assigned there, the new hospital had 90 beds but could be expanded to 200 beds should the need arise. Housed within the USAHB were US Army dental and veterinary facilities and a child care center, bookstore, medical library, public library, and post exchange (ie, store for food and necessities). A German *imbiss* provided us with wonderful soups, sandwiches, and pastries.

The grass, trees, shrubs, flowers, and gardens of the USAHB and its surrounding grounds were beautiful at all seasons (Figure 3). The high metal fences topped with barbed wire, the horizontally closing electronic metal gates, and the guardhouse where the German Guard Battalion patrolled, however, reminded us that the cold war was real. We enjoyed large green plants in every unit and all patient waiting areas. The housekeeping personnel kept the hospital immaculate. We marveled constantly at the shining, reflective hallway floors (Figure 4) The majority of the housekeeping staff members were Turkish women with limited English and German language skills, and they took their jobs quite seriously. The housekeeping contract did not include the OR suites. Perioperative staff members were responsible for cleaning the ORs at the beginning of the day, between procedures, and

BETSY VANE, RN; CAROLYN J. SINGLETON, RN

at the end of the day.

The surgery department consisted of

- two OR suites,
- a waiting room,
- a kitchen area,
- a decontamination room with a washer-sterilizer,
- an instrument soaking room,
- a flash sterilization room,
- a large sterile supply room, and
- several offices.

We performed between 40 and 80 surgical procedures each month. The staff included three RNs (ie, two military, one civilian), 11 enlisted US Army scrub technicians, and one civilian OR secretary. There also were three certified registered nurse anesthetists who were Army officers. As in any US Army medical facility, perioperative staff members were responsible for the staffing and smooth functioning of central material services (CMS), which included maintaining two walk-in steam autoclaves and an ethylene oxide (EO) sterilizer, and for processing and sterilizing instruments and equipment for the entire hospital.

The surgeons were from several different countries and had varied expectations of the nurses. Some of the surgeons were US Army officers, either stationed in Berlin or borrowed from other US military facilities. We had two full-time civilian surgeons—one Japanese and one Turkish—whose accents and customs caused mild confusion at times. We also worked with British military surgeons and civilian surgeons from former West and East Germany and Poland. Several of our health care providers spoke Spanish. The perioperative team was truly a culturally diverse group of people.

Figure 1 • Brandenburg Gate (center), Berlin, remains a reminder of the wall that once divided the city.

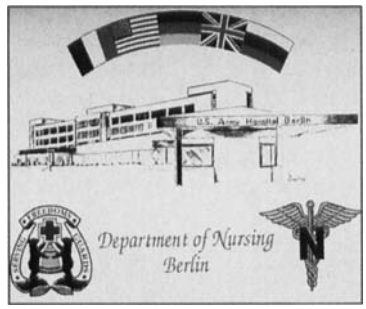

Figure 2 • Department of Nursing, Berlin, annual holiday greeting.

Figure 3 • Grounds adjacent to the US Army Hospital, Berlin.

Logistical differences in the OR. Although the USAHB was accredited by the Joint Commission on Accreditation of Healthcare Organizations, the blend of US and German safety codes and planned return of the facility to the German government influenced the German standards. Each OR had an adjoining anesthesia induction room through which we had to pass to get to the OR. Although we did not use the area for anesthesia induction, we occasionally used the area to shave patients before they arrived in the OR. We pushed pneumatic rubber strips that lined the door frames to open horizontally sliding doors into the OR (Figure 5). It took time for us to get used to doors sliding sideways instead of swinging back and forth.

The scrub sinks were different than those in the United States. We had no knee controls or buttons to push. Instead, we passed our hands in front of an electronic eye under the faucet. The sinks were low for some of our taller staff members, who had to do contortions to trigger the electronic eye and scrub safely. When former East German surgeons worked with us, they were delighted with the sink height because they were accustomed to sitting while they scrubbed.

Ventilation in the ORs was excellent with 19 to 20 air exchanges per hour and no recirculation. Air entered the OR through high-efficiency particulate air filters near the top of the room and exited through specially designed wall spaces near the floor. Most of the medical equipment was German made, with operating directives labeled in German. Most labels were easy enough to understand, but to avoid confusion, we placed additional labels in English alongside the German ones. The towers in the ORs had standard hookups for oxygen, suction, compressed air, and electricity (Figure 6), although these also were labeled in German. German and European Economic Community (EEC) law

required medical oxygen to be in blue cylinders with white shoulders and nitrous oxide—and any other toxic gas such as carbon dioxide—be in gray tanks. The tanks had standard safety connections (eg, different-sized thread codes on the plugs, different-keyed hose connections). The large nitrous tanks stayed chained to the wall in a room down the hall and outside the OR suites. The control panel was backlit with signs reading *Leer* (ie, empty) and *In Betrieb* (ie, in use).

Communications. The hospital communication system (eg, centralized nurse and patient call system, beepers for staff members on call, emergency telephone lines) linked all parts of the hospital and was located in a glassed-in room in the center of the emergency department. The code word for the person operating the communication system was "Maggie" for a female and "Mike" for a male. The OR had push plates on the wall labeled "Maggie" that we used as our emergency communication system.

Waste disposal. We used a patented German waste disposal system that incorporated 2.5-feet-tall cylindrical cans with no plastic liners. The containers were biodegradable and, if buried underground, decomposed into fertilizer. Full containers were loaded into a special autoclave that turned infectious waste into harmless material. Berlin has no landfills; therefore, the waste was burned as regular house waste. Our hospital's disposal costs were measured by container, not by weight, but the maximum container weight allowed was 18 kg (39.6 pounds). The US Army hospitals located in other parts of Germany also had sealable containers for their infectious waste, but they paid for its disposal by the pound. Contractors transported the waste directly to an incinerator or holding area for disposal.

We used red plastic sharps disposal boxes at the USAHB and were surprised that the German hospitals used cardboard sharps boxes. Attitudes about what was considered infectious waste differed among the American, British, and German health care providers because of cultural differences and cost consciousness (ie, some supplies were hard to obtain, were reused multiple times, saved for use at a later time). We also had culturally related differences of opinion concerning hepatitis vaccines, HIV tests, and the need for tetanus immunization or sharps-injuries follow-up. The Americans were viewed as requiring too much paperwork and having too many unnecessary precautions. The British health care providers and patients claimed that even having a documented HIV test could influence their health insurance status.

Sterilizer. Our EO sterilizer used 100% EO, which came in small canisters (Figure 7). We were accustomed to a 12% EO:88% chlorofluorocarbon ratio and to using large EO tanks. One hundred percent EO is mutagenic, carcinogenic, explosive, and self-igniting. The Germans had switched to 100% EO to comply with their environmental protection laws for protecting the ozone layer. The EO sterilizer had been located in the basement of the hospital in the CMS department. All exhaust from the sterilizer then had to be vented to the catalytic converter, which was located on the roof. Building a self-contained system of exhaust pipes and insulation that extended from the basement to the roof cost more than the sterilizer itself; therefore, when the EO sterilizer later was moved to the top floor of the hospital, we took extra safety precautions (ie, the sterilizer had three locks, was behind two locked doors, operators had to wear EO exposure badges).

Respirator equipment was available immediately. There were 28 room air exchanges per hour when the EO sterilizer was in use. The sterilizer required an automatic double-leak check or it would not start. The EO canister was not punctured until the sterilizer was ready to start, and the machine could not be opened until after the evacuation cycle was completed, which could take up to 24 hours. At the end of a normal cycle, the empty EO canister was placed in a basin of water and then disposed of by our logistics department.

BERLIN INTERNATIONAL MEDICAL SOCIETY

An important aspect of the Berlin occupation was the interaction among the Allies. In 1975 the US commander of Berlin formed an organization designed to foster professional and social contacts among US, British, French, and German health care professionals. The Soviets declined an invitation to join. There were four divisions in the Berlin International Medical Society (BIMS): medical, dental, nursing, and administration. Each division sponsored two annual meetings consisting of a scientific presentation followed by a social event. Members of the BIMS interacted at the general membership meeting and the formal dinner dance, one of the annual social highlights of the Berlin medical community. The Americans, French, and British BIMS members hosted these events on a rotating schedule.

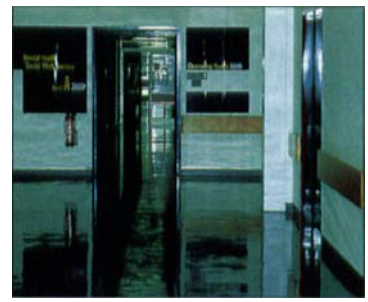

Figure 4 • The pristine floors of the US Army Hospital, Berlin.

Figure 5 • The horizontal sliding doors leading into the OR.

BRITISH COLLEAGUES

The British Medical Hospital in Berlin closed in August 1991. An agreement between Great Britain and the United States allowed the USAHB to provide secondary health care to members of the British forces and their beneficiaries. The British Berlin Group Practice and the Royal Air Force retained responsibility for primary care of British patients. When a British patient was an inpatient at the USAHB, we used US Army documentation until the patient was discharged.

British consulting surgeons performed oral, plastic, and otorhinolaryngologic surgery on British patients at the USAHB. British consultants could not treat US Army beneficiaries, but we could treat British children who were patients undergoing oral rehabilitation (Figure 8). British surgeons were required to use medications approved by the USAHB pharmacy. If, during preoperative interviews, British patients would tell us they were taking Paracetamol and Brufen, we would have to translate this to acetaminophen and ibuprofen. To cut down on any confusion, we kept copies of the British and American formularies. Learning the "American English" equivalents of "British English" nursing terms was a bit more difficult, however (Table 1).

Our medical maintenance department personnel had to approve medical devices or equipment the visiting British surgeon wished to use. Most of the time the British surgeons brought their own scrub personnel, but we always provided the circulators and anesthesia support. The surgeons preferred to use their own instruments, which we processed and maintained for them.

Military nursing differences. We belonged to the US Army Nurse Corps, and the British nurses were part of the Queen Alexandra's Royal Army Nursing Corps (QARANC). Their uniforms had not changed in 100 years (Figure 9). In April 1992, male nurses became members of QARANC. In addition, women officers were given pay equality with males. Members of QARANC received 28 weeks of unpaid postpartum leave. By comparison, male nurse officers were included in the US Army Nurse Corps in 1955; equal pay was instituted in 1942; and, as of 1972, US Army Nurse

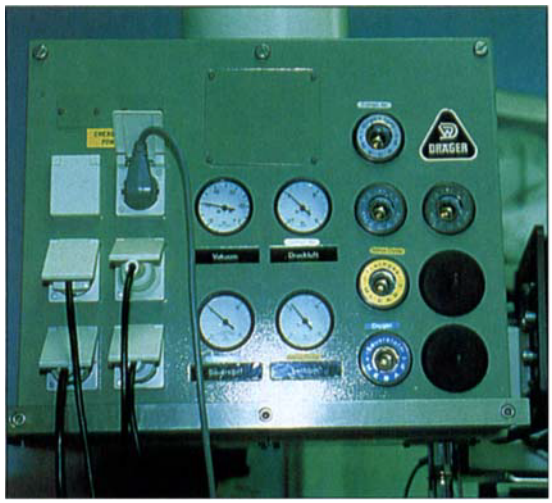

Figure 6 • OR towers showing standard hookups (ie, suction, compressed air, electricity) in German.

Figure 7 • Sterilizer showing the small canister of ethylene oxide attached to the door.

Figure 8 • Oral surgery being performed in the US Army Hospital, Berlin, on a British patient.

Figure 9 • Traditional uniform of British theatre nurse.

Corps nurses who become pregnant remain on active duty and have access to six weeks paid postpartum leave.

There also were differences in American and British nursing education. British nurses were required to be registered general nurses (RGN), then specialize or earn teaching degrees before becoming theatre sisters. They were licensed in the United Kingdom and throughout the EEC as well, regardless of whether they spoke any EEC country's language. In the British Army, the theatre superintendent was the nurse in charge of the OR. The theatre superintendent was expected to function as a scrub person each day and also weekends. The superintendent was in charge of the OR, postanesthesia care unit (PACU), plaster theatre (ie, cast room), endoscopy room, and central service area. The British scrub nurses were responsible for parts of the instrument count. The British surgical technicians were not accustomed to American scrub nurses' requests to count needles and instruments together. Sponges were counted routinely by both parties.

Theatre nurses did not always have the luxury of visiting patients preoperatively because of time constraints. British nursing guidelines included being told "not to interfere" if a patient had many questions, and British nurses were told to recommend that the patient speak with his or her physician. Surgical technicians were taught through the British Army and were called operating theatre technicians. British technicians were responsible for the plaster theatre. Since 1993, the technicians have been required to join a trade union. They pay dues, and the union specifies what continuing education is required.

The majority of anesthesia care providers were male, and they were responsible for patients' drips (ie, IV lines), activity levels, and diets. The anesthesia care provider inserted all IV lines. The British system had no certification comparable to American certified registered nurse anesthetists. The British did, however, have anesthetic sisters, who assisted in theatre and in the intensive care unit. The anesthetic sisters could not intubate patients or give local or regional anesthesia independently.

The British Army had midwives. The midwife's role in wartime was to be a regular scrub technician; therefore, midwives trained in the theatre on different procedures. During cesarean section procedures, however, the midwife would wait with the patient, scrub in, deliver the baby, go to the nursery, and return to close the incision. When the British hospital in Berlin closed, some of the midwives practiced as RNs in the American system. As British midwives, they were accustomed to being independent (eg, suturing, performing episiotomies) and had to adjust to the US system of nursing.

Health care system. Britain's national socialized health system was developed in 1948 with the idea of giving free, equal health care to its citizens. It was thought that if health care were accessible, diseases could be prevented because people would appear with early symptoms, thus decreasing costs. As our British counterparts explained, however, patients face long waiting lists for treatment.

Health care providers are paid according to grade, not specialty. British documentation standards differ vastly from ours because very few legal actions are taken against the British health system. In the British military system, perioperative nurses

document only the patient's name, type of surgical procedure, and names of staff members involved. The charts also contain notes written by the anesthesia care provider and the surgeon.

As American nurses caring for British patients, we tried to meet our patients' cultural needs when planning their care through assessment, planning intervention, and evaluation. We assessed the patient's and family members' needs and expectations. We wanted to provide the same standard of care to our British patients as we did the American patients. We did not, however, anticipate that British patients' expectations of health care would be different from ours. We discovered that many of our British patients found it odd that the theatre and anesthetic nurses wanted to meet with them before and after surgery. The British patients told us that our teaching about what to expect from the course of their stay made them anxious and that they did not care to know all the possible outcomes or side effects. When the American anesthesia care providers and surgeons explained that the US standard of care was to obtain informed consent, some British patients just covered their ears. When the British patients arrived for preoperative interviews, they would hand over their charts and sit and look at us. Some patients showed us large, unusual scars that they thought (but were not certain) resulted from appendix removals. According to one patient's chart, he had had a myocardial infarction, but when questioned, he said no one had ever told him anything about it. Some patients were not quite sure why they were taking the medications listed in their records. Compared to our American patients, many of the British patients appeared passive in their approach to health care.

OR procedures. We discovered that most surgery in Britain was performed with general anesthesia—even minor surgical procedures, such as vasectomies. Local and regional anesthetics were very rare at the time. Many patients did not remember anything from their previous surgeries. Patients were not used to having private hospital rooms, televisions and phones in the rooms, and patient care kits (eg, soap, toothbrush). They often brought their own linen, especially pillows and comforters. Same day surgery or "home care" was rare in the British health care system. On the other hand, long lines, waiting in line, and open bay recovery rooms all seemed natural to our British patients. Putting up both side rails usually met with objection, because that was rarely done "back home." They also requested tea in the PACU.

Even though our OR suite had anesthesia induction rooms (ie, where patients were anesthetized, positioned, prepped in the British system) in the floor plan, the US team did not use them. British OR nurses moved patients directly into the OR, decreasing turnover time between procedures. After surgery, they moved patients to beds in the PACU. Some British nurses were used to extubating patients in the PACU. No verbal reports were made by perioperative or anesthesia staff members

Table 1

BRITISH NURSING TERMS

- *Apicectomy:* Removal of an abscess or cyst at the nerve endings of the upper incisors.
- *Appendicectomy:* Appendectomy.
- *Aqueous, in spirits:* Preps.
- *Bilateral glue ears needing grommets on Master John:* A British officer's son needing tympanoplasty with tube insertion for chronic otitis media.
- *Blade holder:* Knife handle.
- *Blitz at the end of the list:* Terminally clean a room at the end of the day.
- *Bonney:* Rat-tooth forcep.
- *Butler:* Bayonet forcep.
- *Clean sisters:* Circulators.
- *Clips:* Kelleys.
- *Consultants:* Surgeons.
- *Cusco:* Grave's speculum.
- *Diathermy:* Electrosurgical unit.
- *Dirty sisters:* Scrubs.
- *Gauzes, mops, swabs:* Sponges.
- *House officers:* Interns.
- *Ice lollies, fizzies:* Posttonsillectomy flavored ice sticks.
- *Knife to skin time:* Cut time.
- *Lay-up room:* Central material supply or a decontamination and clean room.
- *Platform:* OR bed.
- *Rampley:* Sponge forcep.
- *Stones:* Pounds (ie, weight).
- *Stick scissors:* Suture scissors.
- *Trolley of instruments:* Case cart with instruments.
- *Trolleys to the theatre:* Litters or stretchers to the OR.
- *West:* Weitlaner.
- *Waugh's, Gilleys:* Dressing forceps.

German hospitals received money from the government based on how many beds they had filled the preceding year.

to PACU staff members. Staff members had an emergency button in the PACU, but not in the OR. The disadvantages of the induction room system included the need for duplicate anesthesia equipment, bed accessories, positioning devices, and additional staff members. The British health care professionals we worked with thought the American documentation standards were cumbersome and time consuming.

The British personnel scrubbed with a four-minute povidone-iodine scrub and a three-minute chlorhexidine scrub. They were accustomed to using reusable nail brushes and to reprocessing them. They used linen drapes rather than drapes made of paper or nonwoven material.

GERMAN COLLEAGUES

We also worked with contracted civilian German surgeons and nurses. Germany had an apprenticeship style of nursing education, which was a three-year program geared toward general training for registration as professional nurses. Applicants had to

- be 18 years old,
- have completed secondary education, and
- have performed six months of volunteer service in a nursing home or hospital.

There was no cost to students for basic nursing education, but additional specialty training was a shared expense. Schools of nursing were hospital based. The RN licensure examination included written, oral, and practical elements. After nurses passed the examination, they were licensed to practice in Germany and in any EEC country whose language they spoke fluently.

German female nurses were called sisters and male nurses were called *pflegers*, or caregivers. To become a civilian perioperative nurse, nurses needed to work for two years as regular nurses, after which they received 18 months of training in a teaching hospital with the hospital paying for all expenses. Intensive care anesthesia nursing was a specialty in which nurses could function in both settings; however, they were limited to managing the patients' care after anesthesia induction by a physician.

All German military nurses

- were male,
- enlisted with the rank of at least sergeant, and
- served for an eight-year tour.

In the German Army, civilian nurses held managerial positions. Civilian nurses composed the majority of the nursing staff and transferred within the military hospital system for promotion and experience.

Health care system. Germany, like Great Britain, had a socialized medical system. German hospitals received money from the government based on how many beds they had filled the preceding year. The government would reduce the number of beds and pay less money to the hospital if the hospital's number of full beds decreased. When this happened, German hospitals would attempt to keep more beds occupied (eg, through more inpatient admissions, longer hospital stays). We frequently heard complaints about the length of postoperative stays from American patients who underwent surgical procedures in the German system.

In Germany, all employed people contributed a percentage of their income to health insurance. In return, the employee received *Krankenschein* (ie, hospital credit). When a person saw a physician, he or she took his *Krankenschein* as proof of insurance, and the physician documented the procedures he or she completed. The physician would send the form to the health insurance agency, which would pay the physician according to set rates.

OR procedures. Surgical procedures performed by German surgeons often were of shorter duration than those performed by American surgeons. As an example of the efficiency of the Germans, the Klinikum Steglitz University Hospital in Berlin, which had 17 ORs and 90 perioperative nurses, performed 21,000 procedures per year (ie, an average of 80 procedures each day). The German orthopedic surgeons with whom we worked asked us to apply the patient's tourniquet and Esmarch bandage and prep the patient while they were scrubbing. They did

not release the tourniquet during arthroscopic procedures until the elastic bandages were in place. German orthopedic surgeons used, at a maximum, 400 cc of saline during any arthroscopic procedure, and their patients had an average tourniquet time of 20 minutes.

The German surgeons performed a 10-minute scrub and preferred reusable, autoclavable scrub brushes. German nurses placed warming blankets beneath patients before they arrived in the OR, but after patients were in the OR, there were no special blankets placed on the OR bed. German health care professionals also were accustomed to using the induction room method for anesthesia induction. The anesthetized and prepped patients were wheeled into the OR, where their beds were hooked onto stubs in the floor. At the end of procedures, the OR beds were disconnected from the stubs and wheeled into the PACU. The German PACUs were open bays without curtains between beds. Nudity was treated differently in Germany than in the United States. Patients transferred themselves, nude, across a delineated boundary line onto an OR litter. Some of our German patients questioned why we did not use this system, yet American patients were horrified at this practice.

German surgeons did not order IV lines for every patient; however, if patients needed IV lines, surgeons would insert the lines. The surgeons shaved the patients, and the nurse anesthetists inserted urinary catheters. The German surgeons were not accustomed to our style of arm boards, and although they did not object to their use, they believed the German padded leather restraints that strapped patients' arms to the OR bed were more efficient.

Whenever German surgeons practiced at the USAHB, they were required to comply with our standards. We did not allow single-use items to be resterilized without the manufacturer's approval, a practice our German counterparts considered wasteful. The Germans told us we had far too many disposable items. They wondered why we opened a sterile straight catheter for a short gynecological procedure when we knew the patient had voided before coming to the OR. German ORs scheduled procedures from clean to dirty each day. They thought it was vulgar to have a dirty procedure anywhere in the OR schedule but at the end of the day's procedure list. The former East German surgeons were accustomed to perioperative nurses "turning over" a room between procedures, whereas the West German surgeons were not. In the West German system, orderlies performed that function. German surgeons asked the US nurses if we wanted to drink coffee or smoke cigarettes between procedures, and they could not understand why we chose instead to rush around with specimens, paperwork, and wet vacuums. Beside the obvious procedural differences, we also encountered language barriers (Table 2) in working with our German counterparts.

Table 2

GERMAN NURSING TERMS

- *Kauter:* Electrosurgical unit.
- *Dumb* (ie, silent) *sister:* (West German usage): Mayo stand.
- *Dead sister* (East German usage): Mayo stand.
- *Nonsterile sister:* Circulator.
- *Sterile sister:* Scrub.
- *Mothers-in-law:* Elastic bandage clips.

Environmental issues. The Germans were more environmentally conscious than the US health care personnel. They had stairway lights on timers to conserve electricity at night. Water faucets were not allowed to drip or run if they were not being used. Paper, metal, and plastic were recycled. German health care personnel were provided rubber OR clogs they wore during the day, and then the clogs were collected in hampers, washed, and autoclaved. Our facility required us to provide our own footwear, which was a new requirement for the Germans when they worked in our hospital.

When the first former East German surgeons arrived at our hospital, they kept remarking on the many differences in our patient care systems. They were eager to show us some of their practice techniques. One of these practices was a huge green rubber ball that willing patients used during labor. The woman in labor would sit on top of the ball, which allowed the baby to drop in the woman's uterus in a safe manner, but which also supported the woman's perineum. This tool was adapted for other uses: when a patient experienced considerable right shoulder pain from the carbon dioxide gas used in her laparoscopic procedure, a German surgeon held on to the patient's ankles and rolled her, belly down, across the huge green ball! By the end of the session, the patient stated tremendous relief from the shoulder pain.

SUMMARY

As Americans, we needed to have a firm understanding of our nursing practice, uphold our standards of patient care, and work within our scope of practice. Despite the sociocultural, political, and economic variations among our three countries, we discovered that American, British, and German nurses shared similar issues and concerns. We were reassured that the underlying principles of perioperative nursing were the same internationally. As perioperative nurses, we were able to improve our skills, learn some new techniques, make new friendships, and use our humor on a daily basis—whether anyone else understood it or not! ▲

Betsy Vane, *RN, BSN, CNOR, CPT, US Army Nurse Corps, is staff nurse at Fitzsimons Army Medical Center, Denver, and was an OR staff nurse at the US Army Hospital, Berlin, at the time this article was written.*

Carolyn J. Singleton, *RN, CNOR, is retired and lives in Leavenworth, Kan. She was an OR staff nurse at the US Army Hospital, Berlin, at the time this article was written.*

Acknowledgments: Kathryn Scheidt, RN, MSN, COL, US Army Nurse Corps, chief, department of nursing, US Army Hospital, Berlin; James Whitmire, LTC, US Army, deputy chief, administration, US Army Hospital, Berlin; Robert V. Piemonte, RN, EdD, CAE, FAAN, executive director, National Student Nurses' Association, Inc; Susan Martin, RN, BSN, CNOR, LTC, US Army Nurse Corps; and the US Army Hospital, Berlin, and the Berlin International Medical Society nurses.

The opinions or assertions contained in this article are the private views of the authors and are not to be construed as official or as reflecting the views of the US Army Medical Department or the Department of Defense.

AORN is Online on World Wide Web

AORN now has its own site on World Wide Web (WWW) to facilitate the dissemination of information about perioperative nursing and AORN's products and services. World Wide Web is a system that can be used to gain access to information on the Internet through an easy-to-use, highly graphic, interactive format.

To use WWW, you need a computer, a modem, browser software (eg, Netscape, Mosaic), and an Internet service provider. You can use a national service provider such as America Online, CompuServe, or Prodigy, or, to find a service provider in your area, contact your local public or medical library for assistance. After you are connected, you can gain access to the AORN site at http://www.aorn.org/ using your browser software.

Many books and magazines are available to help new users become comfortable with Internet and WWW technology. Visit the computer section of your local library or bookstore to learn how you can take advantage of the numerous resources available on the Internet. If you have questions about the AORN site on WWW, call Aleece Raw or Kathryn White at (800) 755-2676 x 201.

Hormone May Offer Help to Women With Lupus

Hormone therapy with dihydroepiandrosterone (DHEA) a weak male hormone, may provide relief to women with mild to moderate active systemic lupus erthematosus. Symptoms of lupus include a butterfly-like rash, pleurisy, fever, fatigue, joint pain, mouth sores, and hair loss.

Corticosteriod treatment, the traditional treatment for lupus, can cause weight gain, bruising, striae, osteoporosis, and early cataracts. According to the October 1995 *Rush-Presbyterian-St Luke's Medical Center News Tips,* DHEA is likely to have few or none of the side effects of traditional corticosteriod treatment because it is a weak natural hormone.

P Redd, A S Heinrich, D Modica, "Hormone may offer hope to some lupus patients," Rush Presbyterian-St Luke's Medical Center News Tips *(October 1995).*