Interprofessional Management of a Complex Continuing Care Patient Admitted With 18 Pressure Ulcers: A Case Report

Tamara L. Baker, MScPT; Jackie Boyce, RN; Peggy Gairy, BHScN; and Greta Mighty, BScN

Abstract
Interprofessional practice (IP) — ie, collaborative practice — involves interaction and knowledge-sharing between professionals from different disciplines in order to meet the needs of the patient. This approach to care is well suited to patients with pressure ulcers, whose complex and varying presentations require the monitoring and consultation of an IP team. A 44-year-old man with anoxic brain injury was admitted to a complex continuing care facility with 18 wounds, 17 of which were pressure ulcers. The patient was at high risk for further skin breakdown as a result of immobility, incontinence, impaired cognition, impaired sensation, low body weight, and positioning challenges secondary to contractures and spasticity. Wounds were located primarily around the patient’s sacrum, trochanters, feet, and ankles. The care team included a physician, unit manager, clinical nurse educator, nurses, physiotherapist, occupational therapist, registered dietician, and pharmacist, all with varying roles related to wound care. The patient’s wife was concerned about his overall health status and wanted to move him out of his room in a wheelchair to spend time with him. Using current best practices, the IP team implemented management strategies that facilitated wheelchair time during family visits; plus, all 18 wounds healed within 15 months of admission. The patient did not develop any new areas of skin breakdown. IP collaboration facilitated the problem-solving needed to meet the complex needs of this patient.

Key Words: case study, pressure ulcers, interprofessional patient care team, patient-centered care

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Pressure ulcers, commonly defined as localized injury to the skin and/or underlying tissue usually over a bony prominence as a result of pressure or pressure in combination with shear and/or friction,1 continue to be a financial burden to healthcare systems and a clinical and emotional burden to patients and caregivers. The cost of healing one pressure ulcer in the US often is cited to range from $500 to $50,000; in Canada, 1 month of pressure ulcer care in the community is reported to cost $9,000.2 A 2003 literature review by Woodbury and Houghton3 including more than 14,000 patients from 45 healthcare institutions across Canada found the overall prevalence of pressure ulcers in Canadian settings was 26.2%.

In a qualitative study based on semi-structured interviews, Spilsbury et al4 found that pressure ulcers affect the lives of hospital inpatients “emotionally, mentally, physically, and socially”; pain is a major theme. Given all these factors, management of a patient’s wounds must involve assessment and treatment of the whole patient, not just the wounds. This entails ongoing assessment and collaboration of an interprofessional team.

Interprofessional practice (IP) — ie, collaborative practice — involves interaction and knowledge-sharing between professionals from different disciplines in order to meet the needs of the patient.5 Although the term multidisciplinary has been used to describe a team of professionals working parallel to
A systematic review by Zwarenstein et al identified positive outcomes for IP interventions, including decreased mortality and decreased likelihood of functional decline in an elderly population, in a variety of inpatient settings. The review concluded that evidence supporting IP interventions warrants their implementation. An environmental scan — ie, external review of current practices — conducted by Cote et al in 2008 found evidence of IP care activities among various governmental and professional bodies in Canada and internationally, demonstrating that a higher priority has been placed on IP interventions. In the authors’ province, “A Blueprint for Action in Ontario” was developed to help move IP care forward, again showing an increasing focus on this approach to practice.

The importance of IP care has been recognized in wound care, but research in wound care has focused on multidisciplinary rather than IP care. The purpose of this case study is to describe IP management of a patient with multiple complex ulcers.

**Interprofessional Team Roles**

The authors’ institution is a complex continuing care facility with a 26-bed unit for patients who are semi-comatose or comatose and require respiratory support via tracheotomy care, suctioning, and, in some cases, continuous oxygen. At any given time, 90% to 95% of the patients on the unit have a diagnosis of acquired brain injury and various complex care needs, including pressure ulcers and contractures. The unit’s IP team includes a physician (MD), unit manager, nurses, clinical nurse educator, physiotherapist (PT), occupational therapist (OT), dietitian (RD), and pharmacist. The unit uses a modified version of the primary nursing care model, which involves assignment of a patient’s care to one nurse who is accountable for the care of that patient throughout his/her stay. Because of the long average length of stay on the unit (>1 year), primary nurses are rotated every 6 months. The roles of the professionals on the unit cover a range of patient care needs and many responsibilities overlap. Despite this overlap, frequent IP meetings facilitate discussion and negotiation among professionals in order to minimize confusion or conflict. The MD completes medical assessments unique to his or her role; however, both the MD and the clinical nurse educator perform debridement and write wound care-related orders. The clinical nurse educator has advanced wound care training and is responsible for wound care recommendations. The clinical nurse educator also works closely with the nurses — all of these professionals perform ongoing wound assessment, treatment, and evaluation. The nurses provide the day-to-day wound care; the clinical nurse educator collaborates regularly with them to provide education on best practices.

The nurses also are involved in patient positioning. Because they provide patient care 24 hours per day, they do the regular turning and positioning for pressure relief and redistribution. PTs and OTs, in collaboration with the nurses, are also responsible for positioning. The nurses have detailed knowledge of each patient’s unique positioning needs — they are the team members who know the patient best — and the OT and PT bring specific knowledge and skills related to joint positions and contractures. The OT, PT, and nurses’ roles involve recommending pressure-relieving devices such as mattresses, as well as recommending, designing, implementing, and monitoring the use of foam and other positioning devices. On the unit, the PT focuses on lower extremity positioning and the OT on the upper extremity; this is a largely arbitrary distinction for the purposes of workload sharing and the two professionals often cross-cover as needed. The OT also is responsible for assessing need for and prescription of wheelchairs and specialized wheelchair additions such as cushions and backrests.

The RD’s role is to assess the patient’s weight, diet, lab work, and medical history in order to calculate and adjust nutritional requirements as needed. The RD also assesses the need for micronutrient supplementation, a role shared with the MD.

The pharmacist also shares roles with the MD, specifically the overall medication reconciliation completed for each patient upon admission. The pharmacist receives ongoing orders for medication changes from the MD during the patient’s stay, such as orders for antibiotics when osteomyelitis is suspected or confirmed in a wound. When the team reports that the patient’s needs have changed, as in an increase in pain indicators during dressing changes, the pharmacist reviews the medications and recommends changes to the MD.

The unit manager is responsible for overall quality of care on the unit and for leading the IP team in care provision. The manager ensures adequate resources are available, including wound care supplies and appropriate staffing to meet patient care needs. She fosters team collaboration and innovation in care delivery. The manager, in collaboration, with the IP team, reviews and tracks quality indicators related to wound care.
and facilitates the monitoring and adjusting of wound care treatment plans.

**Case Study**

Mr. J, a 44-year-old married man with one son, suffered a cardiac arrest in 2004 that resulted in an anoxic brain injury and persistent vegetative state. Once stable, Mr. J was transferred from acute care to a long-term care facility where he remained for 4 years until he was transferred back to acute care for aspiration pneumonia. At the time of admission to the acute care facility, Mr. J’s medical records indicated that he had “multiple pressure ulcers.” Although an exact record of the number or location of the ulcers was not available, all ulcers were documented as being treated with

<table>
<thead>
<tr>
<th>Location</th>
<th>Type</th>
<th>Stage</th>
<th>Size (cm) length x width</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Right scapula</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>3 x 4</td>
<td>Approximately 50% slough, 50% black eschar, moderate amount purulent exudate, slight maceration to periwound skin</td>
</tr>
<tr>
<td>Sacrum</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>2.5 x 2.5</td>
<td>Yellow slough with small amount purulent exudate. Periwound skin inflamed</td>
</tr>
<tr>
<td>Coccyx</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>2.5 x 3</td>
<td>Necrotic tissue with small amount purulent exudate and inflamed periwound skin</td>
</tr>
<tr>
<td>Right greater trochanter</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>3.5 x 2</td>
<td>Necrotic with small amount purulent exudate, inflammation and maceration to periwound skin</td>
</tr>
<tr>
<td>Left greater trochanter</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>7.7 x 6</td>
<td>Eschar starting to separate at edges, scant amount of sanguineous/purulent exudate, &gt;2 cm redness around (inflamed)</td>
</tr>
<tr>
<td>Right ischial tuberosity</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>1.2 x 1</td>
<td>Necrotic tissue</td>
</tr>
<tr>
<td>Dorsal aspect left hand</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>1 x 0.5</td>
<td>Black, dry eschar</td>
</tr>
<tr>
<td>Posterior right knee</td>
<td>Trauma possibly due to contracture and positioning</td>
<td>Unstageable</td>
<td>16 x 2.5</td>
<td>Necrotic tissue to &gt;90% of ulcer, starting to separate at edges. Scant amount sanguineous exudate. Pink tissue visible at edges</td>
</tr>
<tr>
<td>Right lateral malleolus</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>1.5 x 2</td>
<td>Approximately 50% slough and 50% black loose eschar to base; small amount foul-smelling exudate. Periwound skin inflamed</td>
</tr>
<tr>
<td>Right medial malleolus</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>1.5 x 1.3</td>
<td>Necrotic tissue</td>
</tr>
<tr>
<td>Left lateral malleolus</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>1.8 x 1</td>
<td>Slough, scant purulent exudate</td>
</tr>
<tr>
<td>Left medial malleolus</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>1.2 x 1</td>
<td>Nonexudating, margins and periwound skin intact (no initial description of ulcer bed available)</td>
</tr>
<tr>
<td>Right heel</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>4 x 3.5</td>
<td>Black eschar with &lt;1 cm redness to periwound skin</td>
</tr>
<tr>
<td>Right lateral heel</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>5 x 2</td>
<td>Black eschar</td>
</tr>
<tr>
<td>Left heel</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>2.8 x 2.5</td>
<td>Nonexudating, margins and periwound skin intact (no initial description of ulcer bed available)</td>
</tr>
<tr>
<td>Right lateral foot</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>6 x 2.5</td>
<td>Black necrotic tissue starting to separate at edges, moderate amount purulent exudate</td>
</tr>
<tr>
<td>Right big toe</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>1.5 x 1</td>
<td>Top of toe, soft black, nail almost off, inflamed</td>
</tr>
<tr>
<td>Right fifth metatarsal and lateral foot</td>
<td>Pressure</td>
<td>Unstageable</td>
<td>1 x 1</td>
<td>Yellow slough with scant exudate, slight redness to periwound skin</td>
</tr>
</tbody>
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an antimicrobial dressing. During that admission, Mr. J developed osteomyelitis. Once his acute care needs were addressed, Mr. J was referred to the authors’ facility.

Assessment.

Physician assessment. On Mr. J’s admission, the unit MD performed a medical assessment and requested wound consultation. When assessed by the clinical nurse educator, Mr. J was found to have 18 wounds (see Figure 1, Table 1): 15 were classified as unstageable pressure ulcers with black eschar/slough1 and two were Stage II pressure ulcers with partial-thickness tissue loss and a pink base. One was classified as a trauma wound; however, the cause was unknown due to lack of detail in the medical record from the referring facility.

Mr. J had contractures of all limbs that contributed to difficulty with positioning. He was totally dependent for all his care and incontinent of bowel and bladder. Mr. J had a gastrostomy feeding tube and a tracheostomy tube. He was nonverbal and did not make eye contact. Given the complexity of the patient’s care needs, the unit manager worked with the team to address staffing and scheduling issues.

Best practice recommends that before establishing wound care goals, a thorough patient assessment must be performed.14 This includes risk factors for further pressure ulcer development, tissue perfusion, nutrition, local factors that impair wound healing, and the patient’s ability to heal the ulcer. These factors help determine wound healability and potential complications. In order to ensure a comprehensive assessment of all risk factors, the clinical nurse educator consulted other IP team members, including nurses, RD, OT and PT.

Nursing assessment. Nursing assessment included a risk assessment for pressure ulcer development using the Braden Scale,17 a validated risk assessment tool with six subscales that are summed for a total score. Mr. J’s Braden Scale score was 9, which meant he was at very high risk for and had a 90% to 100% chance of developing Stage II or greater pressure ulcers.15

Nutrition. The RD conducted a comprehensive nutritional assessment that included assessment of Mr. J’s weight and nutritional intake provided by tube feeding, review of laboratory data and medical history, and calculation of nutritional requirements to promote wound healing. Although he was dependent on gastrostomy tube feedings for nutrition, Mr. J was found to be underweight. The reasons for this nutritional deficiency were not clear from the information received from the referring facility.

Occupational/physical therapy. OT and PT assessments focused on passive range of motion, limb muscle tone, patient resting position and contractures, measurements for appropriate seating, and locations of skin breakdown. Mr. J was found to have no active movement and was dependent for all mobility. He had high tone and significant flexion contractures in all extremities, making positioning a great challenge. No position could offload all of his ulcers. His contractures resulted in increased pressure on vulnerable areas and on existing ulcers such as on his heels (see Figure 2) and coccyx.

Family input. Mr. J’s assessment also included goal-setting with his family. Mrs. J reported frustration and sadness regarding the condition of her husband’s skin. She did not feel she could enjoy her visits with him and she worried about his well-being. Mrs. J wanted to be able to take her husband out of his room in a wheelchair to spend time with him. The goal of the family and focus of the team were to provide opportunity for the patient to be off the unit in a wheelchair as often and for as long as it was safe to do so.

Patient management. In 2006, Keast et al19 updated their best practice recommendations for wound management regarding redistributing pressure, providing systemic support via appropriate nutrition, optimizing the local wound environment, and addressing patient-centered concerns such as pain. The IP care plan for Mr. J incorporated all of these components of best practice wound management.

Pressure redistribution. With so many ulcers on so many parts of Mr. J’s body, pressure redistribution was a particular challenge. The care team reviewed various options. Mr. J immediately was placed on a pressure-relieving, static gel-filled mattress and options for foam rubber positioning devices, often custom-made in the authors’ facility, were considered for placement under the thighs, knees, and/or calves to help raise his feet off the mattress. With his hip and knee flexion contractures, keeping pressure off the feet was very difficult. The team recognized that any object placed under Mr. J’s legs would put pressure on the posterior knee ulcer and, given the patient’s susceptibility to skin breakdown, might increase the chances of developing more ulcers. As a result, five to six pillows were placed under his legs. The team believed the pillows offered two advantages: the increased “give” allows for pressure distribution over a greater surface area and the pillows can be positioned slightly differently each day, depending on the patient’s muscle tone.

Foam-rubber positioning devices also were considered for Mr. J’s upper extremities. The goal was to prevent further flexion posture contractures to allow ongoing nursing care and prevent development of more ulcers. In particular, positioning attempted to prevent Mr. J’s hands and wrists from contacting each other, as redness was developing at the point of contact. OT assistants created C-shaped foam-rubber devices inhouse for each arm from foam-rubber, memory foam, and a cotton-stockinette cover. They fit around the upper arms and under the axilla in order to limit both elbow flexion and shoulder adduction. Mr. J had tight hand and finger flexion, which increased his risk for maceration and skin breakdown. As a result, rolled face towels were placed in his hands to keep his skin dry, minimize pressure, and limit further contracture.
Best practice supports offloading pressure ulcers, but in Mr. J’s case that was not possible because all of his turning surfaces were affected. An individualized turning schedule was developed based on discussion among the team in order to compensate for the inability to offload all pressure ulcers in any one position. Mr. J initially was turned every 1 to 1.5 hours, with the time between turns slowly increasing to the standard of every 2 hours as wound healing progressed.

Another challenge with positioning was keeping the head of the bed elevated at no more than 30˚ to prevent shearing. Because Mr. J was fed enterally, the head of his bed was at 45˚ to minimize the risk of aspiration. Friction and shear became a problem. This was discussed with the team, including his wife. Mr. J’s nutritional status was re-assessed on a monthly basis to determine when he could be switched from a continuous to an intermittent feeding schedule. When that was achieved, the head of the bed was no longer required to be at 45˚ at all times and issues with shearing were notably decreased.

As Mr. J’s ulcers began to close, his wheelchair became another option for positioning. Mr. J was admitted to the authors’ facility with his own tilt/recline wheelchair with an air cushion. Once the OT assessed this wheelchair to ensure it was safe for Mr. J’s use, the seated position became available as a way to redistribute pressure.

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Foam-rubber devices were not appropriate initially for the lower extremities because they interfered with the ulcers. After 1 year, when only two ulcers remained, positioning device use was initiated. A heel-lift bootie was provided to assist with the healing of the ulcer on the right heel, which closed in subsequent weeks.

Nutrition. Mr. J’s first weight upon admission was 40.6 kg; his ideal body weight range (based on the MetLife tables) was 58 to 67 kg. As a result, nutrition intervention goals were weight gain and ulcer healing. The team’s RD increased the amount of calories and protein Mr. J was provided via his tube feedings and increased the flow rate to allow time for the added feed to run. A multivitamin with minerals was provided to ensure adequate micronutrient intake to support wound healing. The RD adjusted Mr. J’s fluid intake as needed to meet increased fluid requirements due to the potential for fluid loss through his exuding ulcers.

After establishing Mr. J’s initial nutritional intake, the RD regularly reassessed Mr. J in consultation with the MD and nurses. Mr. J gradually gained weight, his enteral feeds were well-tolerated, and his ulcers began to heal. As a result, no major changes were made to his nutrition regimen. In order to achieve the family goal of taking Mr. J out of his room and off the unit, the rate of the feeds was slowly increased to allow intermittent feedings.

Once most of Mr. J’s ulcers had healed, the RD decreased the amount of water he was receiving to meet his estimated needs but continued to monitor hydration status. When Mr. J reached his ideal weight range, the nutrition intervention...
goal changed to weight maintenance. The RD decreased his calorie and protein intake accordingly.

**Local wound care.** In addition to controlling or eliminating causative factors such as pressure and providing systemic support such as nutrition, best practice pressure ulcer care includes optimizing the local wound environment. This includes removing devitalized tissue, cleansing appropriately, preventing and/or managing infection, eliminating dead space, protecting periwound skin, managing pain, and controlling odor.16

Dressing orders for Mr. J’s ulcers were based on the observation that all but two contained slough or eschar. After Mr. J’s overall assessment, the team decided that because he was underweight he did not have the physical ability to heal all the ulcers at the same time. Because the two Stage II ulcer beds were dry with no evidence of hair follicles in the base or epithelial tissue at the margins, they were treated with a hydrogel and composite dressing and changed three times per week to provide a moist environment. These two ulcers closed within 1 month of admission.

Before treating the heel and foot ulcers, circulation was assessed using a hand-held Doppler. Mr. J was found to have good circulation to support healing. Three of the ulcers with undermining in four of his ulcers — those on the right scapula, right and left trochanters, and sacrum. All dead spaces were filled loosely with ribbon gauze to prevent premature closure and abscess formation. When symptoms of infection were present, the gauze was soaked in betadine or a silver-based product was used. As each of the ulcers was debrided and drainage decreased, the dressing was changed to a light foam composite dressing.

**Pain management.** As shown in the study by Spilsbury et al.4 pain is an important patient concern associated with wounds. Pain can cause vasoconstriction, leading to decreased tissue perfusion; an adequate amount of oxygenated blood is vital for wound healing.21 Although unable to speak, Mr. J would grimace when in pain, his heart and respiratory rates would increase, he withdrew from touch, and sweating and increased spasticity could be observed. He was medicated for pain with an analgesic 45 to 60 minutes before dressing changes and when pain indicators were observed. Pain symptoms were decreased or nonexistent within an hour after he was medicated for pain, indicating effective pain relief.

**Monitoring.** Once the treatment plan — including pressure redistribution, nutritional support, local wound care, and pain relief — was established, Mr. J was monitored continuously by the team. A Weekly Wound Assessment Form was used to track details of local wound status. Mr. J’s care was reviewed at weekly walking rounds with the MD and nurses at the bedside; at biweekly walking rounds with the entire team; and at biweekly team sit-down rounds. Monitoring also included other team meetings such as once-monthly positioning rounds. These rounds involved a meeting of Mr. J’s OT, PT, and nurse at the bedside to discuss the current care plan for positioning, to identify problems, and to brainstorm solutions. *Ad hoc* meetings occurred among professionals as needed. These included meetings between the nurses and RD to review the patient’s nutritional needs for ulcer healing. During all of these meetings, Mr. J’s care was reassessed by the IP team and appropriate changes were made to the care plan as required.

**Outcomes.** One month post-admission, Mr. J’s two Stage II ulcers were healed and after 1 year 16 of the 18 ulcers healed. The status of the two remaining ulcers, one on the right heel, and the other on the left trochanter, was largely unchanged.

Mrs. J’s goal to take her husband off the unit in a wheelchair was achieved within 3 weeks of admission. This goal
was continuously reassessed based on Mr. J’s changing status. For example, when the team adjusted the enteral feeds to prevent continuous feeding, Mr. J could be away from the unit for longer. As ulcers healed, his wheelchair time increased. With these adjustments, Mrs. J reported feeling happy and appreciative of the care provided to her husband. The team worked closely with her to ensure that Mr. J was in his wheelchair in accordance with her visiting schedule. Mrs. J also began to bring her son and other visitors to see Mr. J because she thought he looked much better.

At 15 months post-admission, all of Mr. J’s wounds had healed. The last to heal was the left trochanter ulcer. His weight had increased to 54.6 kg, closer to his ideal body weight. However, Mr. J’s care continued to be a challenge for the IP team. His contractures persisted and he remained at high risk of developing new pressure ulcers. Fortunately, Mr. J did not develop any new ulcers — 2 years post-admission, he remained ulcer-free. The ongoing goals for his care were to maintain his skin integrity, prevent secondary complications such as aspiration and infection, and allow Mr. J’s wife and son to continue enjoy his company when they visited.

**Discussion**

Best practice wound care involves assessment and management of multiple components of the patient’s care needs. In their 2006 update of best practice in pressure ulcer care, Keast et al. present four recommendations: identify and treat the cause, provide local wound care, address patient-centered concerns, and provide organizational support.

The causes and challenges to healing Mr. J’s pressure ulcers — ie, contractures, immobility, and low body weight — were identified during the IP assessments. To minimize the impact of the patient’s contractures, the team used a specialized mattress, pressure redistributing wheelchair cushion, pillows, and custom foam rubber. To address mobility, a protocol of frequent turning was initiated. To bring Mr. J’s body weight closer to ideal range, caloric intake via enteral feeding was increased.

The team regularly reassessed Mr. J’s local wound environments. Treatments were based on these assessments and included controlling moisture balance, debriding, and preventing and managing infection. All treatment strategies were based on best practice recommendations for local wound care.

The team addressed patient-centered concerns by setting goals in collaboration with the patient’s substitute decision maker, his wife. Mrs. J’s goal was achieved when she was able to take Mr. J off the unit in a wheelchair. Throughout his stay, the team addressed Mr. J’s pain by assessing nonverbal indicators and providing analgesics for comfort.

Part of the organizational support recommended by Keast et al. is to use a collaborative team of professionals specific to the needs of the patient. The value of an IP team for pressure ulcer prevention and management also is recognized by the Registered Nurses’ Association of Ontario. The team working with Mr. J facilitated collaboration among professionals with expertise in various areas of preventing and managing pressure ulcers. For example, the OT and PT were able to comprehensively assess and address Mr. J’s contractures and the challenges of pressure relief. The RD determined a feeding plan that encouraged necessary weight gain. Nurses and the clinical nurse educator assessed and evaluated treatment protocols for local wound management, including dressings and debridement. The belief is that each assessment and reassessment on its own would likely not have been sufficient to heal Mr. J’s 18 wounds — interplay, cooperation, and communication among all team members were required.

The ongoing monitoring and reassessment also included trouble-shooting when certain treatments did not seem effective. Frequent IP discussion at sit-down rounds, bedside rounds, and informal consultations and reassessments allowed for brainstorming from multiple perspectives. For example, when the ulcer on the right hip seemed to stagnate, IP discussion revealed two solutions — a change in positioning and a change in the type of dressing used — that could be implemented together to complement the effects of each on the ulcer.

Even with all of the benefits of an IP team approach, this case had numerous challenges. Once a positioning program was established, ulcers on the right heel and hip continued to worsen. For instance, the heel ulcer was frequently re-traumatized over the course of treatment. Because of the contractures and other wounds, it was difficult to position Mr. J to decrease or remove pressure from the heel. Nurses, the unit manager, OT, and PT regularly discussed and re-examined positioning techniques and devices used, making adjustments for maximum pressure redistribution. An additional challenge was coordinating the team members’ schedule with the schedule of the patient’s family.

Mr. J’s day-to-day nursing care was extremely time-intensive. On days when his ulcers were reassessed, Mr. J’s nurse and the clinical nurse educator spent up to 2 hours measuring the ulcers, applying dressings, and completing the program’s Weekly Wound Assessment Form. This was in addition to his regular care that included tracheostomy care, mouth care, washing, and positioning. When Mr. J had a bowel movement, dressings for the coccyx ulcer were changed due to stool contamination. Once Mr. J began to tolerate sitting in his wheelchair, care on those days also included coordinating mechanical transfers to his wheelchair with his wife’s visits.

Despite the challenges, IP collaboration facilitated problem-solving. Having various members of the IP team present during discussion facilitated increased creativity in thinking of solutions and offered a well-rounded perspective on the risks and benefits associated with proposed management strategies. In the end, continued creativity...
and best practice IP assessments and interventions resulted in the healing of all 18 wounds.

Conclusion
A patient with 18 wounds and several risk factors for further skin breakdown was admitted to a complex continuing care facility and provided an IP approach to care that comprised bedside rounds and collaborative assessment, decision-making, and management. Wound care based on current best practice recommendations was implemented and despite ongoing risk factors, all wounds were healed 15 months post-admission and the patient did not develop any new ulcers. This case report demonstrates the value of IP collaboration and use of current best practices in the management of a patient with multiple pressure ulcers.

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References