FOURTH ISSUE IN THE 2013 SERIES

SECOND ANNUAL

CONQUERING THE CANCER CARE CONTINUUM™

Personalized Treatment Planning

Lillie D. Shockney, RN, BS, MAS

The fourth issue of *Conquering the Cancer Care Continuum* series addresses Treatment Planning Through the Cancer Care Continuum. Following are 2 key articles to provide insight into the role of the clinical pharmacologist as a member of the multidisciplinary team working collaboratively to render recommendations about treatment planning options. Gone are the days, or they should be, when oncology specialists merely passed on – either on paper or electronically – prescription instructions to be filled by the pharmacologist or pharmacist. These individuals, experts in drug management, interaction, and optimization, are integral to the oncology care team. You will soon read and learn why.

Lillie D. Shockney, RN, BS, MAS

And speaking of the team, it is critically important that the patient, and certain family members in some cases, be considered members of the treatment planning team. We should not be doing things to a patient; we must be doing things with a patient. Though the patients, of course, are not experts on oncology care, many have desperately tried to become experts of a sort by turning to the Internet and trying to determine for themselves what treatment would be best for their situation. The goal of the team is optimal medical therapy outcomes.

There are some considerations that have historically been absent but can no longer remain so. Patients want to know about the pros and cons of treatment, risks and benefits, what their quality of life will be while on treatment as well as after treatment is completed. And there is a new wrinkle in the treatment planning process – what will this treatment cost? Will patients have to pay out of pocket for their treatment? Is the cost of treatment worth the clinical outcomes to be achieved? No patients want to leave their family in deep debt, and although we have entered an exciting era of personalized medicine, the cost of these new drugs is incredibly high compared with treatments we have been accustomed to in the past. Even prior treatment regimens have been daunting from a cost perspective.

Everyone wants to make sure that the patient gets the right treatment at the right time and in the right way. Now clinicians must realize that treatment for treatment's sake is never wise and not the mission. Thoughtful decisions about treatment are a must, and patients, oncologists, pharmacologists, palliative

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care providers, everyone, must come together for the common good of what will now be, going forward, the right treatment. More is not necessarily better. A primary challenge too will be family members who out of desire to have their loved one alive will state they want "everything humanly possible to be done." We must respect the treatment goals and hopes of the patient, however, and steer the family members to do the same.

So when you think about it, we are looking at treatment from the perspective of its "value." Yes, a new era. Perhaps even overdue… ■

Personalized Treatment Planning: A Nurse's Perspective

Beth Faiman, PhD(c), MSN, APRN-BC, AOCN

It is projected there will be 18.1 million cancer survivors in 2020, with an estimated $173 billion of associated cancer care costs in the initial and last year of life.[1] The cost of healthcare has grown exponentially since the 1990s due, in part, to improved diagnostic techniques, better treatments, and an aging population. Cancer patients are increasingly involved in healthcare decisions and faced with many options in determining the best course of therapy with the hope that the treatment they decide upon will provide the best personal outcome. Quality of life, ease of treatment administration, and convenience may be the most important factors when selecting anticancer therapy for individuals of older age, poorer health, or with advanced disease. Few cancer types have a standard approach that produces definite results, and many uncertainties are attached to most anticancer treatments. National guidelines exist but do not often take into account personalized factors in their recommendations. It is also likely that patients will be given several treatment recommendations to consider before effective anticancer therapy can be initiated.

Beth Faiman, PhD(c), MSN, APRN-BC, AOCN

When a cancer diagnosis is made, the patient and providers go through various aspects of a decision-making process to select the best treatment for the individual. Nurses and healthcare providers are often the primary sources of information for patients. However, resources such as the Internet, social networks, and additional miscellaneous influences have been cited as determining factors for patients who are balancing one cancer treatment decision over another.[2] In this fourth installment of *Conquering the Cancer Care Continuum*, we will discuss a patient case that illustrates the importance of treatment planning and decision making in the era of personalized medicine.

Mr P is a 78-year-old male who initially presented to his primary care provider (PCP) for an annual physical. He had a history of cigarette smoking, 1 pack per day for 45 years, but quit smoking when he underwent a 3-vessel coronary artery bypass graft procedure at the age of 60 years. He has moderate chronic obstructive pulmonary disease, although his symptoms are currently controlled with a combination inhaler daily. He has a "rescue" inhaler that is used for dyspnea on exertion. He has been using his inhaler a few more times a week than in the past. He is a retired autoworker but remains active at home and in the garden. He lives with his wife, aged 76 years, who is in general good health.

On evaluation, the patient had a routine complete blood count and differential (CBC+diff) performed. Results showed mild anemia (hemoglobin 10.3 g/dL). His white blood cell (WBC) count was slightly low (2.8). Blood

platelet count was normal (151). The PCP repeated the CBC 1 month later, and results were similar. The patient had no specific complaints and was scheduled for follow-up evaluation 6 months later.

At the next visit, the blood hemoglobin was 10.4 g/dL, WBC 2.1, and platelets 98. A routine anemia panel did not suggest bleeding (normal ferritin, folate, vitamin B_{12}, and methylmalonic acid). He was referred to a hematologist. A bone marrow biopsy was obtained that showed 10% blasts and unilineage dysplasia (megakaryocytes). Interphase fluorescence in situ hybridization (FISH) analysis for selected genetic abnormalities associated with myelodysplasia was performed. FISH was positive for an abnormal clone that was characterized by a deletion of the long arm of chromosome 20, del(20q). He was diagnosed with myelodysplastic syndrome (MDS), Revised International Prognostic Scoring System (IPSS-R) stage low-intermediate risk.[3,4]

To determine whether to initiate chemotherapy for treatment of MDS, the National Comprehensive Cancer Network (NCCN) guidelines for treatment of patients with MDS were consulted. The NCCN has established treatment algorithms to guide practitioners in the care of patients with MDS and take into account patient attributes (age, performance status, comorbidities, and general health) and disease characteristics (cytogenetic abnormalities and risk of progression) to determine an appropriate course of action.[5]

With knowledge of patient and disease characteristics, a meeting of the patient, family, physician, nurses, and nurse practitioner (the treatment team) took place. The treatment team informed the patient of the risks, benefits, and alternatives to treatment. The options included starting a hypomethylating agent (HMA) or watchful waiting with routine office visits every 2 months. Mr P had researched the diagnosis of MDS on the Internet and was concerned about the cost of the medications as he is on a fixed income. He also learned from the Internet that frequent trips to the hospital would be required. Transportation to the hospital would be a challenge as his wife does not drive and his children live out of state. For these reasons the patient did not want to begin HMA treatment, which was reasonable given the low risk to progress to acute myelogenous leukemia (AML) at the time of diagnosis.

After the family meeting, a treatment plan was created in which Mr P would be watched closely by the nurse practitioner. The patient was to return for an office visit and labs that included a CBC+diff every 2 months to assess for symptoms of progressive anemia or leukopenia. Should he develop progressive anemia or leukopenia, the plan was to initiate hematopoietic growth factors. If growth factors did not help to raise the blood hemoglobin and leukocyte counts, the patient would then consider other options such as chemotherapy "when I really need it."

Discussion

The case example illustrates key components of the decision-making process in this era of personalized medicine in which treatment decisions are made in collaboration with healthcare providers, spouses or significant others, family members, and friends. Treatment decisions are rarely made independently by the patient alone.

Personalized medicine practices are integral to the health and well-being of cancer patients in today's healthcare system.

Decision making is defined as the cognitive process of reaching a decision and includes weighing and balancing the risks and benefits among multiple options.[6] Decision making in cancer is usually informed and shared. Informed decision making in cancer occurs when the individual has adequate knowledge about the risks, benefits, and limitations of the procedure, the ability to participate in decision making, and when one comes to a decision congruent with personal values.[7] Shared decision making is a process in which the patient, family, and treatment team work to achieve mutual goals. If patients share in the decision-making process with a group, they are more likely to adhere to the treatment plan, and their quality of life can be increased.

Informed/shared decision-making practices commonly occur in patients with advanced cancer.[8] Personalized medicine practices are integral to the health and well-being of cancer patients in today's healthcare system. Costly therapies and longer survival can lead to physical and financial burdens to the patient and family. In addition, older adults and those with advanced cancer can experience a low level of health literacy due to concurrent comorbid conditions and polypharmacy use. Each of these

factors can confound decision making.[6] For many reasons, informed/shared decision-making processes become quite attractive, as the final decisions can be costly both physically and financially.

With knowledge gained through research, treatment can be personalized and tailored to the individual, as in our example of the patient with MDS. MDS represents a spectrum of hematologic malignancies characterized by dysplastic hematopoiesis that leads to peripheral cytopenias. The goals of therapy for MDS are based on individualized disease characteristics, patient characteristics, and risk category, as individuals such as our case example have cardiopulmonary comorbidities and advanced age.[8,9] The treatment team in the example considered patient (older age, comorbidities, and transportation issues) and disease characteristics (cytogenetics, IPSS-R risk score) and employed a shared/informed decision-making approach.

Knowledge of guidelines such as those developed by the NCCN provides an algorithmic framework but is not often prescriptive.

Personalized treatments are a hallmark of MDS, yet a main challenge for the patient and provider is how to decide the best treatment from a wide variety of options. The IPSS-R risk categorization is a critical component of treatment selection. The IPSS was developed to reliably estimate survival and risk of transformation to AML. Risk category for transformation to AML, patient desire for treatment, and financial considerations were critical factors in the informed/shared decision-making process.

Last month Mr P complained of chest pain and went to the emergency department. A chest x-ray was obtained that showed right upper lobe pneumonia. His hemoglobin was 7.2 g/dL, WBC 0.8, and platelets 22. A bone marrow biopsy was performed that showed 35% bone marrow blasts. Cytogenetics, FISH, and flow cytometry analysis confirmed the diagnosis of AML. Mr P's diagnosis was no longer MDS. He had transformed to a more aggressive AML.

Mr P was admitted to the hospital for combination chemotherapy for AML. He received supportive care (blood and platelet transfusions, fluids, and antibiotics). On day 10 of admission he was placed on telemetry as he was found to be in atrial fibrillation and developed congestive heart failure. He developed a severe fungal blood infection. At day 14, a bone marrow biopsy was performed to determine response and remission status. The bone marrow biopsy showed 46% bone marrow blasts. The patient, wife, and children met with the treatment team. The treatment team informed Mr P and his family that the chemotherapy must be repeated but that the response to chemotherapy would be low. Mr P would be placed at risk for further infections and heart problems. Mr P felt "too weak" to continue with another course of chemotherapy and didn't want additional treatment unlikely to provide benefit. He wanted to enjoy what time he had left at home with his family. Mr P was discharged home to hospice the next day.

Conclusion

Treatment planning and decision making are key components of advanced cancer care. Knowledge of guidelines such as those developed by the NCCN provides an algorithmic framework but is not often prescriptive. A plethora of treatment or supportive options exist for any one cancer. Taking into account disease status, comorbid conditions, and, above all, patient preferences is critical. A strategy for providers would be to use informed/shared decision-making processes that will add to the value of personalized medicine and hopefully translate to improved outcomes. ■

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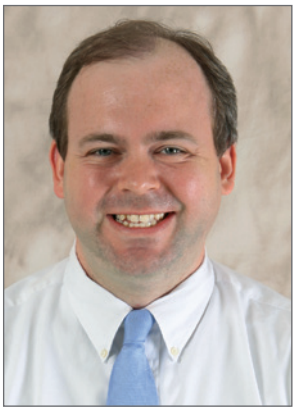
Personalized Treatment Planning: A Pharmacist's Perspective

Steve Stricker, PharmD, MS, BCOP

JS is a 62-year-old female diagnosed with a stage IIB (T2, N1, M0), estrogen receptor/progesterone receptor–negative, HER2-negative invasive ductal carcinoma of the breast 18 months ago and treated with bilateral mastectomy followed by adjuvant docetaxel and cyclophosphamide (TC). Recently, she felt an enlarged supraclavicular lymph node that was subsequently biopsied and showed recurrence of her disease. She presents today for discussion regarding selection of chemotherapy in the recurrent/metastatic setting.



Steve Stricker, PharmD, MS, BCOP

Scenarios like the one above are a daily occurrence in cancer centers around the country and around the world. These situations are fraught with emotion and anxiety as patients are informed, most commonly, that their disease is no longer curable. In these moments, patients and their families seek assurance that as an oncology healthcare team, we are evaluating every reasonable option and are deciding upon a treatment plan that offers the greatest hope for the patient to live as long as possible and with the greatest quality of life. Throughout this series on *Conquering the Cancer Care Continuum*, we have focused on the multidisciplinary nature of modern oncology medicine and the role that highly trained and specialized providers from a variety of disciplines (medicine, pharmacy, and nursing) can play in managing the patient with cancer. Here, we will discuss the role of the clinical oncology pharmacist in consultation with the oncology team in defining the patient's treatment plan.

Chemotherapy Planning

For patients such as JS, the treatment plan that will ultimately affect future clinical decision making with regard to drug therapy begins with the determination of the initial adjuvant chemotherapy regimen. The reader will have recognized that because JS has triple-negative breast cancer, there is no indication for endocrine therapy or HER2-targeted drugs such as trastuzumab. While targeted therapies may not play a role for JS, selection of adjuvant chemotherapy still requires an educated decision on behalf of the oncology team. The National Comprehensive Cancer Network (NCCN) clinical practice guidelines for breast cancer offer consideration of 4 category 1 recommendations for patients such as JS. These include TAC (docetaxel, doxorubicin, and cyclophosphamide), AC (doxorubicin and cyclophosphamide) given in the conventional every-3-week manner or in a dose-dense every-2-week option, and TC.[1] For common malignancies such as breast cancer, each provider or cancer center likely has adopted 1 (or more) of these treatment standards for use in patients such as JS. Based on results of a phase 3 clinical trial in which TC was demonstrated to be superior to AC with regard to disease-free survival and overall survival, we selected TC for JS.[2,3] In addition to improvements in efficacy, the anthracycline-sparing nature of this regimen makes it a reasonable option for patients who have a history of heart disease or are found to have an unacceptable left ventricular ejection fraction by echocardiogram or multigated acquisition scan. However, our treatment plan for JS is not yet complete! Let's evaluate ways in which the clinical oncology pharmacist can contribute to the success of the healthcare team and ultimately patient outcomes in the setting of drug utilization.

First, in many cancer centers, the oncology pharmacist is responsible for the development of written chemotherapy protocols. On first glance, this action may be regarded as a technical task that could be delegated to nonhealthcare-trained paraprofessionals. However, the American Society of Clinical Oncology (ASCO) in conjunction with the Oncology Nursing Society

(ONS) have placed great importance on this activity. In their Standards for Safe Chemotherapy Administration, ASCO-ONS recommend that these protocols, or treatment plans, be preprinted, standardized, and completed by an appropriate oncology provider. Furthermore, they recommend that a rationale and justification be provided, complete with appropriate references, if orders deviate from standard protocols.[4] Each step of this process is guided by the intent to ensure safe handling and administration of all cytotoxic and biologic drugs used in the cancer center. The role of the oncology pharmacist in contributing to and supporting, via the medical literature, both standard and nonstandard chemotherapy prescribing relates additionally to the Joint Commission of Pharmacy Practitioners Vision of Pharmacy Practice. This collaboration composed of representatives from many of the major professional pharmacy organizations has issued a vision statement that reads, "Pharmacists will be the health care professionals responsible for providing patient care that ensures optimal medication therapy outcomes."[5] Preparation of standard order sets for chemotherapy is one of several steps through which the oncology pharmacist is often involved in treatment planning for patients with cancer.

Next, it is important to recognize that most oncology pharmacists who practice in a clinical capacity have not only completed a doctor of pharmacy degree but also years of additional residency training and often board certification in oncology practice. This additional specialized training allows for the development of an expertise gained while training side by side with physician colleagues and validated via board exams similar to those taken by oncologists. As such, these pharmacy providers can have a much greater impact on the patient's optimal medication therapy outcomes. In many centers, the clinical pharmacist rounds with the oncology team, sees and assesses patients with the oncologist, and provides recommendations for management in accord with accepted clinical practice guidelines and based upon an intense depth of knowledge of clinical trial results and the medical literature. These "advanced practice" pharmacists provide what may be regarded as a second opinion, without the patient traveling for a second opinion. Through this decision-making capacity, clinical pharmacists have an opportunity to contribute directly to the management of the cancer patient and provide an invaluable resource to the oncology healthcare team and, arguably, a marketable advantage to the cancer center.

When we consider the case of JS and her newly recurrent breast cancer, we see an opportunity for collaboration of providers (medicine, pharmacy, and nursing) to evaluate the best choice of therapies in the context of her response to and tolerance for adjuvant chemotherapy, her performance status at the time of this visit, and her goals for therapy moving forward. Because this is not meant to be a commentary on "how we treat breast cancer," I will avoid the in-depth discussion that typically occurs but rather share a couple of examples of how clinical decision making might take place for a patient such as JS. For example, it is well established within the oncology literature that taxane-based therapies can induce peripheral neuropathy, some degree of which may be irreversible. If JS had experienced severe neuropathy or continued to suffer from this as a long-term consequence of her exposure to docetaxel, it would be entirely reasonable in the recurrent/metastatic setting to avoid other drugs known to have a similar toxicity profile (eg, *nab*-paclitaxel). Likewise, if she had some degree of renal insufficiency, avoidance of platinum drugs, especially cisplatin, would represent an informed decision and, in essence, personalization of therapy for this patient. Certainly these decisions are made singularly by oncologists on a daily basis in centers without clinical pharmacists. However, when healthcare providers collaborate, the patient ultimately becomes the greatest beneficiary as barriers to therapy may be more likely to be prospectively identified and avoided, resulting in better patient outcomes.

Because it has been nearly 15 months since JS completed adjuvant TC chemotherapy, and her tolerance for that treatment regimen was outstanding, the oncology team presumes that she still has taxane-sensitive disease and elects to treat her with nab*-paclitaxel. Note that while combination chemotherapy regimens may result in better efficacy, additional toxicity is also often observed. It is for this reason that the NCCN Guidelines offer both single agents and combinations of agents as appropriate first-line therapy for patients with recurrent/metastatic disease.*[1]

Supportive Care Planning

For patients with cancer, the focus predominantly becomes the selection of the best treatment for their disease. However, the supportive care needs of the patient cannot be overlooked and should also be considered integral to their well-being. A classic example of this is prophylaxis of chemotherapy-induced nausea and vomiting (CINV). Multiple studies have evaluated the functional impact and cost of care that arises as a result of CINV and found that patients who are poorly managed are more likely to experience an inability to eat and drink, to want to spend time with family and friends, and to maintain normal daily function. Furthermore, direct and indirect healthcare costs are also greater in this patient population.[6] Appropriate identification of an individual's risk factors for CINV, and evaluation of the treatment regimen based on Paul Hesketh's well-regarded research related to the acute emetogenicity of these agents, should allow the oncology team to avoid this potential therapy pitfall and protect the patient's quality of life.[7]

The TC regimen that JS was initially treated with is classified as moderately emetogenic and was managed appropriately with a 5-HT_3 antagonist and dexamethasone. As a result, JS experienced only minimal nausea and no breakthrough emesis during or after each of her chemotherapy infusions. In the recurrent/metastatic setting, single-agent chemotherapy is often utilized, and many of these drugs have a low to moderate risk of CINV. While this simplifies the supportive care management of these patients, it is still a relevant concern that must not go overlooked. In many cancer centers, pharmacists play an integral role in evaluating, managing, and monitoring patients with regard to CINV. Not only does this improve patient outcomes, it also frees up the oncologist to manage other patient issues.

For JS, nab*-paclitaxel is classified as low emetic risk, and she received no CINV prophylaxis. However, prescriptions were provided to her for ondansetron and promethazine to be used as needed at home. Routine monitoring during her ongoing* nab*-paclitaxel therapy has thus far revealed minimal requirement for antiemetic drugs. Overall, JS has tolerated this chemotherapy well, and recent scans demonstrate that her disease has responded. Nonetheless, the oncology team has already begun thinking about the next treatment option in an effort to stay 1 step ahead of her disease!*

CINV is not the only supportive care problem that patients with cancer experience. Pain management, corticosteroid prophylaxis, bowel regimens, etc, are also very real medication-related issues that pharmacists may contribute to managing. Those interested in learning more should read previous issues of *Conquering the Cancer Care Continuum* as they relate to many of these other quality-of-life concerns.

Conclusion

It is evident that not all cancer centers employ pharmacists who function in the capacity discussed here. Having been trained in this manner and functioning in this role on a daily basis, I would be remiss to not advocate for the role of highly trained clinical oncology pharmacists whose participation in direct patient care enhances patient experiences within the cancer center and improves patient outcomes. Development of a treatment plan for patients with cancer is a hugely complex and utterly organic process that may change based upon a multitude of patient-specific factors whose identification is paramount to ensuring optimal outcomes. We have barely scratched the proverbial surface of this issue, but hopefully the ideas expressed here may provide some degree of insight into the thought process behind clinical decision making as it relates to developing treatment plans for patients with cancer. ■

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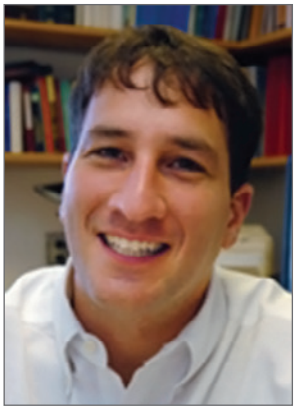
Personalized Treatment Planning: A Physician's Perspective

Jeffrey A. Meyerhardt, MD, MPH

In this issue of *Conquering the Cancer Care Continuum*, Ms Faiman and Dr Stricker focus on aspects of treatment planning in cancer patients. While they come at the topic from slightly different angles, both cases illustrate that deciding on whether to treat patients, which drugs to use, and what other supportive medications to consider is not a simple cookbook process. In this commentary, I will provide a perspective on my conversations with patients and then discuss some pressing issues that are emerging in this area.



Jeffrey A. Meyerhardt, MD, MPH

As a medical oncologist, consideration of cancer-directed therapies needs to be a discussion with the patient and family/friends (if the patient chooses to involve others). Even though guidelines help direct choice of drugs based on a patient's disease and stage, all of these conversations need to include an option of not choosing treatment (at least treatment directly at the cancer, ie, chemotherapy). While FOLFOX (5-fluorouracil, leucovorin, and oxaliplatin) would be the standard therapy for a patient with stage III colon cancer, it is still the patient's option to receive any treatment. My personal style is to discuss not receiving chemotherapy first and then go back to it at the end. My rationale is that although we are starting to make advances in personalized medicine, ultimately we cannot definitively predict which patients will benefit from a given therapy and what degree of toxicities they will experience. Thus, there is no chemotherapy that I am aware of that is 100% guaranteed to help every patient with that cancer type and stage. As such, on an individual patient level, there is the potential that a treatment will cause more harm (toxicity) than benefit. Next, as I discuss treatment options, one needs to be cautious both on how to interpret clinical trials and how to communicate such results to patients. For example, if I discuss the advantage of one chemotherapy regimen (regimen A) to another regimen (regimen B) as first-line therapy for pancreatic cancer, it is neither accurate nor helpful to a patient to state that regimen B will increase your survival by 4 months. In reality, regimen B may not result in 1 day more of survival for that patient, or it may result in 1 or more extra years of life. Unfortunately, we do not know how to definitively determine who benefits and who does not, and for how long. While these conversations should not become lessons in epidemiology and statistics, they do need to convey a level of understanding of what an improvement of 4 months means. Lastly, discussion of potential toxicities and potential ways to manage them is key in helping a patient decide on a therapy choice; however, again, providing a sense of the variability in tolerance is important. I believe these conversations should be a team effort (potentially including the oncologist, nurse practitioner, physician assistant, nurse navigator, infusion nurse, pharmacist, etc) and should not be done in just one sitting. Further, I emphasize to patients that these are fluid conversations, and reassessment of tolerance and activity regularly are necessary to balance quality of life with efficacy.

While such an approach is my typical practice, several growing forces are important to discuss. Ms Faiman brought forth one of them in her case of the patient considering cost when choosing not to treat his myelodysplastic syndrome. Unfortunately, and to many of us, tragically, the cost of cancer therapies continues to rise with each new drug approved. Cancer treatment comprises 5% of the overall healthcare costs. Total costs have doubled in the past 20 years, although overall healthcare costs have also doubled. We have drugs that could cost someone (the patient, the insurer, or both) at least $100,000 per year – dou-

ble the median income in the United States. Realize that is the cost of 1 drug alone, not including the rest of the care for that patient. Until recently, cost was never or rarely in the conversation regarding cancer care. Increasingly, it needs to be integral to the conversation. However, it needs to be integral in an informed way, but unfortunately we are still limited on how best to do that. Going back to my example of pancreatic cancer, let's assume regimen B costs twice as much as regimen A, and the improvement in median survival is 4 months. Is 4 months worth double the costs? Obviously, an immediate question is what are the costs – $1 versus $2 is not so bad; $15,000 versus $30,000 is more substantial. Again, median survivals do not speak to an individual patient, and we need to know which patients gain an extra year or 2 of life, where double the cost may be more reasonable, and which patients gain only a week of life where double the cost may not be reasonable. Along with this concept, both Ms Faiman and Dr Stricker cite National Comprehensive Cancer Network (NCCN) Guidelines to help make treatment choices. The issue with these and many other guidelines and compendiums is that often many choices are provided. In the case of metastatic breast cancer, the NCCN provides more than 35 chemotherapy options after hormonal therapy. However, the financial costs of these regimens vary greatly. While not all the regimens have similar efficacy or are appropriate for every patient

Until recently, cost was never or rarely in the conversation regarding cancer care. Increasingly, it needs to be integral to the conversation.

with that condition, there are usually multiple regimens that one could consider that have a similar likelihood of benefit for a patient. Thus, cost probably should be added into the equation regarding treatment planning. While I am not sure what the best way is to integrate into guidelines both efficacy, toxicities, personalization, and costs, I am confident we need to figure it out soon.

In summary, treatment planning is a key to the care of our cancer patients. Treatment planning is not simply going to a book or guideline and picking a regimen off a list. Planning requires consideration of the patient's condition, patient's goals, risk of therapy, potential benefit, and costs. ■

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PRELIMINARY AGENDA*

FRIDAY, NOVEMBER 15

12:00 pm - 12:30 pm **Welcome**
- *Conference Co-Chairs: Sharon Gentry, RN, MSN, AOCN, CBCN Lillie D. Shockney, RN, BS, MAS*

12:30 pm - 2:00 pm **PRE-CONFERENCE WORKSHOPS**

Basic Navigation Track
- *Tricia Strusowski, MS, RN*
- *Nicole Messier, RN, BSN*

OR

Advanced Navigation Track
- *Elaine Sein, RN, BSN, OCN, CBCN*
- *Danelle Johnston, RN, MSN, OCN, CBCN*

2:00 pm - 2:45 pm **BREAK IN THE EXHIBIT HALL**

2:45 pm - 3:30 pm **General Session 1: Top 10 Best Practices**
- *Moderators – Conference Co-Chairs: Sharon Gentry, RN, MSN, AOCN, CBCN Lillie D. Shockney, RN, BS, MAS*

3:30 pm - 5:00 pm **Administrator's Track**
- *Mandi Pratt-Chapman, MA*
- *Michele O'Brien, MSN, ACNS-BC, RN, BA*

OR

Case Manager's Track

5:00 pm - 6:00 pm **FREE TIME**

6:00 pm - 8:00 pm **Welcome Reception/Posters in the Exhibit Hall**

SATURDAY, NOVEMBER 16

6:30 am - 7:30 am **Breakfast/Product Theater (non–CME-certified activity)**

7:45 am - 8:00 am **Welcome and Introductions**
- *Conference Co-Chairs: Sharon Gentry, RN, MSN, AOCN, CBCN Lillie D. Shockney, RN, BS, MAS*

8:00 am - 8:30 am **General Session 2: The Future of AONN (The AONN Business Meeting)**
- *Sharon Gentry, RN, MSN, AOCN, CBCN*
- *Lillie D. Shockney, RN, BS, MAS*

8:30 am - 9:15 am **General Session 3: Community Needs and Navigation**
- *Lillie D. Shockney, RN, BS, MAS, on behalf of the Global Breast Health Initiative*
- *Jennifer Klemp, PhD, MPH, MS*

9:15 am - 10:00 am **General Session 4: Development and Application of Evidence-Based Guidelines in Cancer Care: The NCCN Perspective**
- *Liz Danielson, MHA*

10:00 am - 10:45 am **BREAK IN THE EXHIBIT HALL**

10:45 am - 11:30 am **Keynote: Update on Guidelines**
- *Linda Ferris, PhD*

11:45 am - 12:45 pm **Lunch/Product Theater (non–CME-certified activity)**

1:00 pm - 1:45 pm **General Session 5: Onco-Politic Barriers**
- *Dan O'Connor*

1:45 pm - 2:30 pm **General Session 6: Addressing Disparities of Care**
- *Swann Arp Adams, PhD, MS*
- *Michelle Weaver Knowles, RNC, BSN*

2:30 pm - 3:15 pm **General Session 7: Oncology Medical Home**

3:15 pm - 3:45 pm **BREAK IN THE EXHIBIT HALL**

3:50 pm - 4:35 pm **General Session 8: Meeting the Needs of the Adult and Child Survivor Throughout the Life Span**
- *Christy Roberts, RN, BSN, OCN*

4:35 pm - 5:20 pm **General Session 9: The Role of Complementary Therapies in Navigation**
- *Linda Lee, MD, AGAF*

5:30 pm - 7:30 pm **Poster Award Reception**

SUNDAY, NOVEMBER 17

6:30 am - 7:30 am **Breakfast/Product Theater (non–CME-certified activity)**

7:45 am - 8:00 am **Welcome and Introductions**
- *Conference Co-Chairs: Sharon Gentry, RN, MSN, AOCN, CBCN Lillie D. Shockney, RN, BS, MAS*

8:30 am - 8:45 am **General Session 10: Navigator's Role in Tumor Boards**
- *Laurie Mathis, RN, BS, MAS*

8:45 am - 10:30 am **DISEASE SITE–SPECIFIC BREAKOUTS**
- **Breast Cancer Navigation & Survivorship**
  - *Karen Dow Meneses, PhD, RN, FAAN*
  - *Vinnie Myers*
- **Thoracic Oncology Navigation**
  - *Gean Brown, RN, OCN*
- **GI & Colorectal Cancer Navigation**
  - *Darcy Doege, RN, BSN*
  - *Kristen Vogel, MS, CGC*
- **GYN Cancers Navigation**
  - *Penny Daugherty, BSN, RN, OCN*
- **Prostate Cancer Navigation**
- **Head, Neck, & Neuro Navigation**
  - *Tamara Bowen, RN, BSN, MHA*
- **Pediatric Oncology**
  - *Kathy Ruble, RN, CPNP, PhD*
- **Hematology/Oncology Navigation**
- **Melanoma Navigation**
  - *Sherry Riggins, RN, BSN, OCN*

10:30 am - 11:15 am **BREAK IN THE EXHIBIT HALL**

11:15 am - 12:00 pm **General Session 11: Understanding the Role of the Primary Care Physician**
- *Michael Kolodziej, MD*

12:15 pm - 1:15 pm **Lunch/Product Theater (non–CME-certified activity)**

1:30 pm - 2:15 pm **General Session 12: Navigator's Role in End-of-Life Care**
- *Lillie D. Shockney, RN, BS, MAS*

2:15 pm - 3:00 pm **General Session 13: Music & Medicine: A Dynamic Partnership**
- *Deforia Lane, PhD, MT-BC*

3:00 pm - 3:15 pm **Conclusion of the Conference/Final Remarks**
- *Conference Co-Chairs: Sharon Gentry, RN, MSN, AOCN, CBCN Lillie D. Shockney, RN, BS, MAS*

*Preliminary agenda, subject to change.

Survivorship Conference

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CONFERENCE CO-CHAIRS

Program Director:

Lillie D. Shockney, RN, BS, MAS
University Distinguished Service Associate Professor of Breast Cancer
Depts of Surgery and Oncology
Adm Director, Johns Hopkins Breast Center
Adm Director, Johns Hopkins Cancer Survivorship Programs
Associate Professor, JHU School of Medicine
Depts of Surgery, Oncology & Gynecology and Obstetrics
Associate Professor, JHU School of Nursing
Baltimore, MD

Sharon Gentry, RN, MSN, AOCN, CBCN
Breast Nurse Navigator
Derrick L. Davis Forsyth Regional Cancer Center
Winston-Salem, NC

FACULTY*

Swann Arp Adams, PhD, MS
Tamara Bowen, RN, BSN, MHA
Gean Brown, RN, OCN
Liz Danielson, MHA
Penny Daugherty, BSN, RN, OCN
Darcy Doege, RN, BSN
Karen Dow Meneses, PhD, RN, FAAN
Linda Ferris, PhD
Sharon Gentry, RN, MSN, AOCN, CBCN
Danelle Johnston, RN, MSN, OCN, CBCN
Jennifer Klemp, PhD, MPH, MS
Michael Kolodziej, MD
Deforia Lane, PhD, MT-BC
Linda Lee, MD, AGAF
Laurie Mathis, RN, CBCN, OCN
Nicole Messier, RN, BSN
Vinnie Myers
Michele O'Brien, MSN, ACNS-BC, RN, BA
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Mandi Pratt-Chapman, MA
Sherry Riggens, RN, BSN, OCN
Christy Roberts, RN, BSN, OCN
Kathy Ruble, RN, CPNP, PhD
Elaine Sein, RN, BSN, OCN, CBCN
Lillie D. Shockney, RN, BS, MAS
Tricia Strusowski, MS, RN
Kristen Vogel, MS, CGC
Michelle Weaver Knowles, RNC, BSN

**For full information visit www.aonnonline.org*

CONFERENCE OVERVIEW

AONN's Fourth Annual Conference will continue to advance the navigation profession by expanding the scope of educational sessions, networking opportunities, and poster presentations. In addition, this year's conference will address the evolving challenges of program improvement, the role of personalized medicine, and implementing best practices in navigation, survivorship, and psychosocial care.

TARGET AUDIENCE

This activity was developed for oncology nurse navigators, patient navigators, social workers, and case managers.

CONTINUING EDUCATION INFORMATION

Learning Objectives

Upon completion of this activity, the participant will be able to:

- Discuss the evolution of the role of navigation in healthcare.
- Assess strategies for navigating diverse patient populations by cancer type and environmental factors.
- Define methods for providing patient support and guidance in the age of personalized cancer care.
- Evaluate best practices regarding survivorship and psychosocial care.

SPONSORS

This activity is jointly sponsored by Medical Learning Institute Inc, Center of Excellence Media, LLC, and Core Principle Solutions, LLC.

COMMERCIAL SUPPORT ACKNOWLEDGMENT

Grant requests are currently being reviewed by numerous supporters. Support will be acknowledged prior to the start of the educational activities.

REGISTERED NURSE DESIGNATION

Medical Learning Institute Inc.
Provider approved by the California Board of Registered Nursing, Provider Number 15106, for up to 16.25 contact hours.

2013 CONFERENCE REGISTRATION

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