# Bulletin \$\frac{1}{2}

VOLUME 32 • NUMBER 1 WINTER 2014

# **Promoting Play in the Child Life Community**

ypically, when we think of the word "play," we think of theoretical definitions posed by scholars long before our field was established, broad definitions that have helped child life specialists to carve their niche into the healthcare team and other community settings. In this issue of the *Bulletin*, we are pleased to feature articles by three winners of conference presentation scholarships awarded as part of the Advancing the Field of Play for Hospitalized Children Initiative, supported through a grant from Disney. Each presenter's article introduces a unique way of translating some of these theories into action for patients and families around the world. Whether a recipe for play maps and life lines from Deb Vilas, a description of playroom practices from Victoria White, or a consideration of loose parts play from Deb Vilas, Caitlin Koch, and Loxy Passmore, these articles demonstrate some of the ways that child life specialists continue to break the mold every day in developing new techniques for helping children and families to cope with the challenges of hospitalization and treatment. And they do so using the true language of childhood – play.



Child life specialists use play for many purposes, including establishing rapport, educating, and encouraging the expression of emotions. (Pictured here, Crystal Soberg, CCLS, plays with patients in a LeBonheur Children's Hospital playroom.)

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#### In Focus:

Essential Oils as an Adjunct to Pre-Operative Preparation of Children for Outpatient Surgical Procedures Frequently Asked Research Questions



# Child Life Alphabet

# V is for Volition: Turning Distraction into Planned Alternate Focus

Anne Luebering Mohl, PhD, CCLS and Joy Goldberger, MS

The major goal of procedural support is to empower children and their families with a sense of mastery that will carry over into future challenging situations. Often, distraction is the default intervention of choice for staff and families, and if it results in completion of the procedure, we may conclude that distraction was a useful tool. But is the goal of child life intervention just to make a procedure "go well"? Can a sense of mastery truly be gained from distraction? Employing the child's volition to transform distraction into planned alternate focus better aligns our intervention with the goal of empowering the child.

Distraction for child life specialists often consists of holding an age-appropriate book, toy, or app between the child and the distress-provoking event to divert his or her focus from the medical proceedings. Afterwards, the child life specialist may document that "patient was supported through distraction," but what this really means is "I drew the child's attention away from the noxious stimulus." When a child life specialist distracts a child, the active agent in that situation is the child life specialist. The child is relatively passive, just having their attention pulled away by the child life specialist. Procedural success should not depend on the child life specialist's distraction efforts, but on a child's own coping processes. A child who is not the active agent in the interaction is not building coping skills and gaining mastery over a challenging situation.

Distraction involves the layering of one intense stimulus on top of another. For a

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# PRESIDENT'S PERSPECTIVE



# The Value of Change

Amy Bullock Morse, MSEd, CCLS

As I think about the dynamic changes that the Child Life Council (CLC) is experiencing, I find

myself reflecting on a previous professional experience that also involved significant change. In 2006, I was the Director of Square One, a non-profit focused on injury prevention and early intervention. Square One was part of Smart Beginnings, an early childhood consortium in Virginia established by former Governor Timothy Kaine. Smart Beginnings engaged key stakeholders with the Virginia Department of Social Services, Virginia Department of Education, Virginia Early Childhood Foundation, and colleges and hospitals throughout the state to develop several best practice models around early care and education to advance school readiness. One initiative was the Virginia Star Quality Initiative (VSQI), a state-wide quality rating system for child care providers. The VSQI provides a means by which quality in childcare centers and preschools could be assessed, improved, and communicated through a rating system. Data is made public, providing parents with an opportunity to identify a high-quality resource for their young child. While the VSQI is quite successful today,

its development was met with considerable questions and concerns. Childcare providers were concerned that they would not qualify for the highest rating and lose business. Other stakeholders were hesitant to develop a universal rating system for all early childhood centers, acknowledging the vast differences between home and center-based day care. Square One worked with Smart Beginnings to develop training modules for early childhood workers that were convenient, low cost and, more importantly, met the requirements for the VSQI. By working together, the organizations within the consortium were able to provide resources for all interested child care providers to meet their goals to obtain the highest quality rating.

I understand the stresses and uncertainties associated with major changes in a complex, expansive system. But I also value the benefits and opportunities such changes can bring. As CLC President, I will work hand-in-hand with the Board of Directors and Child Life Council staff to make sure that the strategic initiatives outlined in the 2012-2014 Strategic Plan, and executed thoughtfully by our talented colleagues, move the child life profession forward in a positive direction. Each strategic initiative will complement our past work, building on a strong professional foundation to create

new opportunities for CLC.

As I reflect upon the first half of my presidency, I am struck by my colleagues' commitment and enthusiasm as they continue to work tirelessly to advance our profession. CLC is fortunate to have a volunteer workforce of over 250 members who approach our organization's strategic initiatives with creativity and passion. As a result of their commitment, CLC has been able to significantly advance all four Overarching Goals and corresponding initiatives from the 2012-2014 Strategic Plan.

Task Force 2022, the Program Standards Task Force, and the Internship Accreditation Task Force have done a considerable amount of work to develop evidence-based practice models that advance our academic preparation and clinical training programs in North America. The Professional Benchmarking Task Force is currently facilitating a pilot study with over 40 child life programs across North America that explores the ways in which we measure clinical services and staff productivity. Research and Scholarship Committee members continue to work tirelessly to review research proposals that support our clinical practice. With the support of Disney, CLC was able to partner with a consulting group and facilitate child life specialist focus groups to better understand our profession's leadership development priorities. The company's generosity also provided CLC with the resources to facilitate an International Summit following the CLC Annual Conference in New Orleans in May 2014. These are just a few examples of the tremendous work that CLC's volunteer leadership has accomplished over the last year. I am so proud of CLC's ability to embrace change and continue to explore ways to reduce barriers that impede our association's progress.

The Child Life Council has an exciting year ahead with new resources that will advance the skills of our members and services we provide for children and families. As health care delivery continues to evolve, I am proud that CLC continues to think broadly about trends in the marketplace and the ways in which we may progressively support patients.



#### Child Life Council Bulletin/FOCUS

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Published quarterly in January (Winter issue), April (Spring issue), July (Summer issue), and October (Fall issue). Submission deadlines for consideration for each issue are as follows: Winter: October 1; Spring: January 1; Summer: April 1; Fall: July 1. For more information on submitting articles, please see *Submission Guidelines* in the *Bulletin Newsletter* section of the CLC Website.

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# FROM THE EXECUTIVE DIRECTOR



# 2013: A Year of Strategic Initiatives for CLC

Dennis Reynolds, MA, CAE, CLC Executive Director

ast year was very busy and productive for the Child Life Council (CLC),

and 2014 promises to be equally exciting. If there is one highlight of 2013, it is the progress we made on the strategic initiatives that emerged out of the 2012-2014 CLC Strategic Plan. It can be difficult to talk reflectively about these long-term initiatives without also calling attention to their future evolution in 2014 and beyond, and while progress on the Strategic Plan constitutes some of the more visible steps forward, CLC has also made progress on many other, more familiar fronts as well, including the Annual Conference on Professional Issues, the CLC Bulletin, the introduction of the CLC App Catalog, and continuing to provide the certification structure for the child life profession. But for purposes of this column, I would like to bring attention to the progress we have made in addressing the very ambitious goals and objectives put forth in the Strategic Plan.

# Advancing the Child Life Profession

There have been several groups within CLC that made tremendous strides in 2013 in their work on major dimensions in the evolution of the child life profession.

- Academic Preparation: Task Force 2022 continued its work on defining a path towards the eventual advanced degree requirement for new child life specialists entering the profession in 2022 and after.
- The Internship Accreditation Task Force completed most of its work in defining the policies and procedures for accrediting child life internship programs. As with accrediting academic programs, the accreditation process for internship programs will unfold over a number of years.
- The Program Standards Task Force continues its work in developing a voluntary recognition process for child life programs.

- The Practicum Task Force has developed a set of proposed standards defining content areas and outcomes for practicum programs.
- The Diversity Task Force continues to work on its dual charge of investigating ways to promote cultural sensitivity within the child life profession and measures to increase diversity recruitment into the profession.
- The Professional Benchmarking Task Force has launched a trial among a number of child life programs to collect data that will enable programs to benchmark their staffing patterns and other dimensions of service.
- The Public Policy Task Force completed its work, and as per its recommendation, a Public Policy Work Group has been formed with the charge of informing the membership and the CLC Board on public policy issues of importance to the child life profession.

# Launching and Sustaining Other Key Strategic Initiatives

CLC made great progress in launching and following through on a number of other key initiatives called for in the 2012-2014 Strategic Plan. We have been very fortunate to receive some very generous support from Disney to assist in making progress on a number of these initiatives.

- CLC developed the outline of a Leadership Development program and contracted with Nourse Leadership Strategies to further develop concepts that will result in programs and services designed to help child life professionals hone their leadership and management skills.
- Thanks to Disney, the strategic priority of promoting and facilitating important research projects in the field came to fruition in 2013 in funding two studies investigating the clinical and financial impact of child life services in the overall scheme of pediatric health care in hospitals.

- CLC has been working closely with member and volunteer leader Ellen Hollon to conduct outreach to identify individuals in other countries involved in pediatric psychosocial care. We are very pleased that Disney has funded an International Summit to take place in New Orleans in May 2014 immediately following the CLC Annual Conference on Professional Issues.
- We were pleased to be able to commission CLC member Deb Vilas to undertake a survey of play policies, procedures, and practices in child life programs. A summary of the play survey can be found in this issue; more is available on the CLC website at http://www.childlife.org/files/ ReportPlayPracticesInnovationsSurvey.pdf.

As 2014 begins, we recognize that child life programs in a variety of locations continue to face stress and strain. This is a very uncertain time for hospitals and health care providers due to impending health care reforms and the financial anxiety being felt at many hospitals today. We hope that the initiatives described here can be part of a formula that keeps child life specialists, and the child life profession, on pace with the health care community at large and moving forward amidst the uncertainties.

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# **Co-Creating Meaning: Loose Parts in the 7th Dimension**

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t a time when deep, child-centered play is on the decline and children's opportunities for creative problem solving and meaning-making are limited, education about and advocacy for the vital role of play is crucial. At the 31st Annual CLC Conference on Professional Issues we sought to revitalize attendees' passion for play through revelation of an innovative therapeutic play technique: *loose parts interventions*.

## THEORETICAL GROUNDING

As child life specialists and members of the healthcare team, we each play a distinctive role in the evolution of theory and practice of play and meaning. Together we celebrate the historical foundations of new discoveries, as well as the potential for continued variations of application in the world. One particular newly evolving framework, which we refer to as loose parts, involves interaction between four components: the developmentalinteraction approach, the child-centered approach, Victor Frankl's notion of Will to Meaning, and the concept of loose parts. These four theories, when taken together, can expand our understandings of and use of play to help children cope with stressful medical experiences.

### DEVELOPMENTAL-INTERACTION APPROACH.

Resting on the shoulders of Piaget and Vygotsky, the developmental-interaction approach describes how children's "modes of apprehending, understanding, and responding to the world change and grow as a consequence of their continuing experience of living" (Cuffaro, Nager, & Shapiro, 2000, p.263). Cognition and emotion are interconnected; how a child feels influences how she thinks and learns. The optimal educational process involves collaborative, interactive engagement with the environment (Cuffaro et al., 2000).

**CHILD-CENTERED APPROACH.** The child-centered approach grew from Carl Rogers' client centered therapy through the work of Virginia Axline, Louise Guerney, and Garry

Landreth (Landreth, 2012). It celebrates the healing relationship between therapist and client, acknowledging the locus of healing within the child. This approach maintains a deep respect for the child's ability to solve his/her problems and gives the child the opportunity to do so. The responsibility to make choices and to institute change is in the child's hands (Landreth 2012).

WILL TO MEANING. Victor Frankl sought to understand the psychological and spiritual components of survival of the Holocaust. He proposed that "the meaning of life differs from man to man, from day to day and from hour to hour. What matters therefore, is not the meaning of life in general but rather the specific meaning of a person's life at a given moment" (Frankl, 2006, p. 77). This piece of the theoretical puzzle resonates as we empower the child to make his own meaning out of his diagnosis and treatment, as opposed to passively taking on our interpretation of his experience.

LOOSE PARTS. The concept of "loose parts," coined by architect Simon Nicholson (1972), provides direction in the provision of play materials that promote mastery and empowerment. Nicholson believed that "we are all creative, and that 'loose parts' in an environment will empower our creativity" (Belinda, 2009). Unlike prefabricated toys, "loose parts" are open-ended materials that encourage children to use their imaginations, and can include anything and everything from masking tape to cardboard boxes and string.

# LOOSE PARTS IN THE HOSPITAL SETTING: An Innovative Technique

The incorporation of loose parts leads our practice away from a prepackaged model of intervention and toward a creative approach that allows children to contribute to the process of making meaning out of their own situations. While loose parts materials have been a hallmark of child life practice for years, theory-driven, intentional application of loose parts is a relatively novel technique.

**DIMENSIONS OF INTERVENTION.** The depth of potential healing for hospitalized children rests on a continuum of interventional dimensions. An intervention that includes

interaction and play and incorporates openended materials to facilitate creativity and problem-solving, holds the highest potential for healing. Below, a surgery preparation is deconstructed to illustrate the possible dimensions of intervention:

Possible Intervention
The child is lied to about the surgery
The child is told nothing about the surgery
The child life specialist verbally explains the surgery to the child
The child life specialist uses visual aids (book, photos, tablet) to show examples of what the child will see
The child life specialist uses medical equipment and a doll to show the child what he will see, feel and hear
The child is given time and space to play with the materials.
The child life specialist uses loose parts to customize prep materials.
Following a verbal explanation of the diagnosis/procedure, the child life specialist provides the child with loose parts and scaffolding to co-create a 3-D interpretation of the diagnosis/procedure.

# LOOSE PARTS IN THE REAL WORLD

The following case study highlights the power of collaborative, open-ended interventions in helping children make meaning from their experiences, obtain mastery, and move toward healing.

Marco, a bright and inquisitive ten-year-old, spent days on end in the hospital's playroom, waiting for his brother to "get better." Several weeks prior, Marco was asleep in the room he shared with his older brother Oliver when he awoke to sounds of gasping and gurgling. Fifteen year-old Oliver had suffered a ruptured brain aneurysm.

For the first weeks of Oliver's hospitalization, Marco displayed little interest in learning about Oliver's medical condition. One afternoon, however, Marco approached me and stated that he was ready to learn about what had happened that night. After explaining Oliver's

illness using analogies and drawings, I asked Marco what he would think about building a

model of a brain aneurysm. Marco excitedly expressed enthusiasm for the project.

Together, Marco and I gathered various materials from the playroom cabinets and placed them in the center of a round table. Marco then stated that our first task was to create a brain. Per his suggestion, we proceeded to coil snakes of white model magic atop a Styrofoam bowl. Marco selected a long piece of catheter tubing to serve as a vein, and draped it over the brain. Next, we discussed various options for creating the thin wall of the vein, where the aneurysm had occurred. Marco snipped off a small portion of a

rubber glove, which he secured between two pieces of catheter tubing. He mixed red paint with water to symbolize blood. Using a syringe, Marco pushed blood through the "vein." When the "blood" reached the clamped portion of the tubing, the rubber segment ballooned out, representing the aneurysm. Marco continued to push fluid through the tubing, eventually causing the rubber portion to burst and bleed out onto the brain. As the balloon burst, Marco exclaimed, "That's exactly what happened to my brother! That's why he can't talk anymore!"

## INFINITY AND BEYOND!

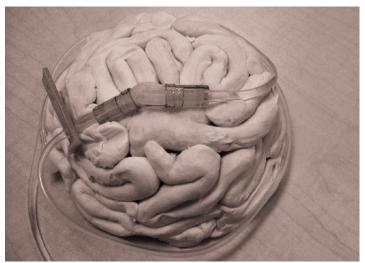
Creative application of loose parts in the 6th dimension led to the formulation of an additional dimension of intervention:

DIMENSION	Possible Intervention
7th Dimension (Infinity and beyond!)	The child life specialist involves the family and medical staff in the use of loose parts, extending the locus of power and expertise beyond himself/herself.

# **LESSONS LEARNED**

In the months following the debut of this technique at the CLC Conference, child life specialists around the country have contacted the presenters to share their success in implementing loose parts. Stories detailing creative loose-parts interventions with individual patients to reflections on applications of the technique in medical play groups suggest that the possibilities are indeed endless. One program director even led her team in a loose parts contest at a staff meeting.

Where might loose parts make an appearance in your program?



A patient's rendition of a brain with an aneurysm, created using loose parts.

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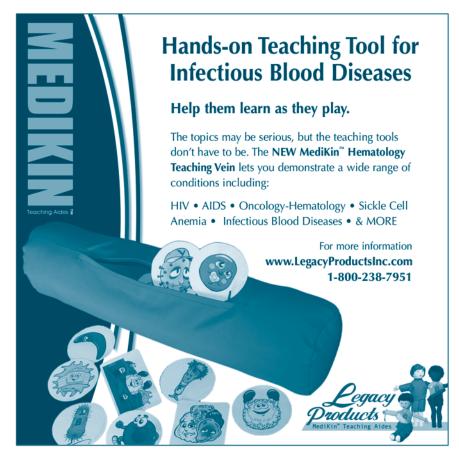
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# Play Maps and Life Lines: New and Borrowed Techniques for Crossing Cultural and Generational Divides

Deborah B. Vilas, MS, CCLS, LMSW, Bank Street College of Education, New York, NY

When we think of cultural proficiency and family-centered care, perhaps play is not the first modality that comes to mind as a way to cross divides and build relationships. However, play is a universal language. All adults played at some point in their childhoods. With this in mind, Play Maps and Life Lines are two ways to engage and connect with children and families in healthcare environments.

The techniques are borrowed from other disciplines (McLaughlin, 2010; Gregg, 2002) and tweaked to fit the needs of child life specialists working with children facing issues of loss and illness. The goal of both techniques is to connect patients and families with inner resources of coping and hope through heightened awareness of past joys

# PLAY MAPS

The Play Map is an expressive art activity designed to connect children and adults with pleasurable memories of play. It connects the child with past joys, helping them imagine present and future times of happiness. When done in tandem with a caregiver, it builds connection and shared appreciation between adult and child.

#### MATERIALS

- Paper
- · Pencil/Pen
- Crayons/Markers/Water color pencils/Paint

#### Instructions

Ask child to draw a map of a place where they like to play, showing the place, toys, types of play and people involved. They can draw a place representing outdoors or inside, or one of each. Show a simple sample of one that you draw on the spot.

For children who have been hospitalized a long time, you may need to add the prompt: "A map about what and where you played before you got sick".

Ask the caregiver to do the same, thinking about childhood memories of places they played, people they played with, and the type of play they most enjoyed.

Have the child and adult compare their maps and share memories and details about games, rules, toys & playmates. How are they different and how are they the same?

Consider asking the child to draw one map about their play at home, and one that depicts their play at the hospital.

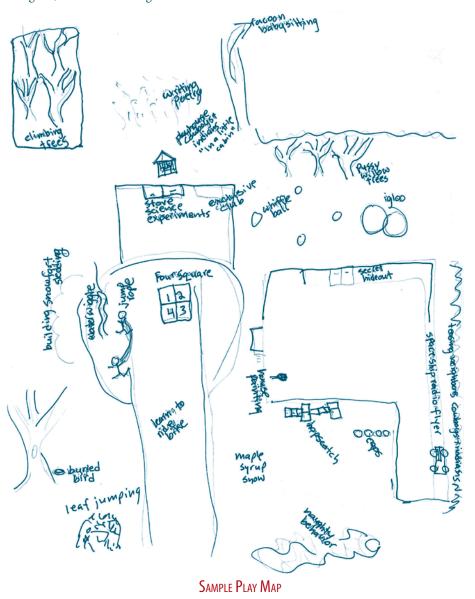
and obstacles. An equally important goal is empowering connection, understanding, and empathy between family members through conversation about similarities and differences in memories of play and life experiences.

In addition to my presentation at the 2013 CLC Conference, I taught these techniques in a graduate course entitled *Therapeutic Play Techniques for Child Life Specialists* at the Bank Street College of Education. In the class evaluations, I received heartwarming and inspiring feedback from students and specialists about the techniques. Meghan Coughlin, Bank Street College of Education

child life alum, joined me in my presentation at the conference in Denver to share one such story of how the Life Line activity gave hope to a teenager who did not expect to survive to her next birthday. Not only did the Life Line help this teen begin to conceive of a future for herself, the activity planted seeds for her to obtain her GED and move forward to attend college.

One of the CLC Conference participants asked me how we can prove that this type of activity is therapeutic and does what we claim it can do. I believe that the evidence is 

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# CHILDLIFE COCUS

VOLUME 32 • NUMBER 1 WINTER 2014

# Essential Oils as an Adjunct to Pre-Operative Preparation of Children for Outpatient Surgical Procedures

# **A**BSTRACT

There is potential for pediatric patients who spend time in the pre-surgery unit to become anxious while waiting for surgery. Anecdotal observations and conversations with parents reveal that patients who are tired and have not eaten can become irritable in the presurgery holding area. This study explored the feasibility of using bubbles infused with essential oils in the pre-surgery setting as way to reduce children's anxiety in the preoperative area. We used a block-randomized feasibility model at a single free standing children's hospital in the Midwest region of the United States to test whether blowing bubbles infused with essential oils reduced anxiety levels to a greater degree than blowing unscented bubbles. Participants included fifty children (age three to eleven years) scheduled for outpatient tonsillectomy, adenoidectomy, myringotomy and tubes, or an ophthalmology procedure. The Yale Preoperative Anxiety Scale (m-YPAS) was used to assess the patient's anxiety level at three time points: upon entering the pre-surgery holding area, after a the child engaged in medical play and bubble blowing, and during anesthesia induction. We found no statistically significant reduction in anxiety with the use of the essential oil infused bubbles vs. the control bubbles. However, both interventions showed a reduction in anxiety. We believe that integrating holistic and child friendly interventions such as blowing bubbles can help pediatric patients manage their anxiety levels when preparing for and undergoing medical procedures.

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n recent years, more and more patients have undergone outpatient procedures and surgeries (Lynch, 1994). Pre-surgery anxiety may be related to different factors, such as baseline personality, temperament, developmental level as compared to chronological age, and previous hospitalizations or hospital experiences (Lynch, 1994). It has also been shown that separating from family while transitioning to the operating room produces high anxiety for patients (Manworren & Fledderman, 2000).

Many studies have specifically addressed the use of psychological preparation prior to surgery to help reduce the anxiety that patients may experience (Lynch, 1994; Hatava, Olsson, & Lagerkranser, 2000). As a result, many hospitals have developed pre-surgery teaching programs (Lynch, 1994; Hatava et al., 2000) to empower patients and families with information and provide an opportunity for them to explore and manipulate the medical equipment they will be exposed to throughout their hospitalization. The goals of providing these experiences are to improve the patient's level of understanding, to increase coping, and to reduce anxiety prior to surgery.

Part of a child life specialist's role is to increase a patient's level of understanding regarding surgery and the perioperative experience. A child life specialist can engage patients in a medical teaching session to help them gain knowledge of the

medical equipment they will be seeing. A child life specialist can also teach patients various coping techniques, including simple breathing exercises and the use of guided imagery. Child life specialists use many items for distraction, including bubbles, which can be a great diversion before, during, and after a procedure or surgery. According to the American Academy of Pediatrics, "the child life specialist focuses on the strengths and sense of well-being of children while promoting their optimal development and minimizing the adverse effects of children's experiences in health care or other potentially stressful settings. Using play and psychological preparation as primary tools, child life interventions facilitate coping and adjustment at times and under circumstances that might prove overwhelming otherwise" (Child Life Council & Committee on Hospital Care, 2006, p. 1757).

However, due to the time constraints and the large number of patients who are scheduled for surgery daily, there may not always be time and resources to allow for full psychological preparation by a child life specialist. In these cases, patients may still find benefit from shorter and more copingfocused child life interventions such as blowing bubbles. Bubbles can capture patients' attention and slow down their breathing while they focus on blowing to create the bubbles. Unfortunately, little has yet been done to systematically evaluate the use of bubbles in reducing the pre-operative anxiety of children in the surgical holding area. The purpose of this study was to examine the use of bubbles with and without essential oil infusions in relation to the anxiety levels of children preparing to undergo day surgery.

continued from Focus page 1

## LITERATURE REVIEW

Medical aromatherapy is the therapeutic use of essential oils for healing (Lapraz, Hedayat, & Kenner, 2013). Aromatherapy has been used since antiquity. It is versatile because it can be inhaled, applied topically, or used internally. Inhaled essential oils are effective because the olfactory nerve (which detects smell) in the nose connects indirectly to the amygdala. The amygdala affects emotions and hormones via the hypothalamus (master hormone gland) and the frontal cortex (higher level thinking and perception) (Hedayat, 2008, May). Studies have shown that medical aromatherapy can positively affect heart rate and blood pressure (Haze, Sakai, & Gozu, 2002), anxiety (Hongratanaworakit & Buchbauer, 2004a; Hongratanaworakit, Heuberger, &

# About the Views Expressed in Focus

It is the expressed intention of *Focus* to provide a venue for professional sharing on clinical issues, programs, and interventions. The views presented in any article are those of the author. All submissions are reviewed for content, relevance, and accuracy prior to publication.

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Buchbauer, 2004b), concentration (Perry, Bollen, Perry, & Ballard, 2003), and restful sleep (Dayawansa et al., 2003). Initial studies have also shown that medical aromatherapy is similarly beneficial and safe for children (Fitzgerald et al., 2007) and effective in the hospital environment (Hedayat, 2008a, Hedayat, 2008c).

When inhaled, volatile hydrocarbon compounds, of which essential oils are composed, stimulate an electro-chemical transmission from the olfactory bulb to the amygdala, where emotional memories are stored. Anxiety, depression, fear, and anger all emanate from this region. Scents can alter the brain wave patterns, slowing them down into a more relaxed state (Hedayat, 2008a). Inhaling essential oils therefore stimulates the brain, hormones, nerves, and immune system through the olfactory nerve in the brain (Stöcker et al., 2006). Inhalation also allows the vapors to enter the throat, larynx, trachea, lungs, and bloodstream, similar to the way gas anesthesia or asthma medication affect the body (Hedayat, 2008, May). Within the first five minutes of inhaling the essential oils, patients receive a majority of the suspected calming effects (Atsumi & Tonosaki, 2007; Masago, Matsuda, & Kikuchi, 2000).

Several experimental studies with healthy adults have shown that inhalation of essential oils can reduce an anxiety and fear response as measured by EEG activity, heart rate, blood pressure, and secretion of adrenaline (Dayawansa et al., 2003; Haze et al., 2002; Hongratanaworakit & Buchbauer, 2004a; Mehta, Stone, & Whitehead, 1999). To date, few studies have evaluated the effects of essential oils on patients in the clinical setting. However, those that have evaluated this have demonstrated that essential oils can be used safely and effectively in the inpatient setting (Mehta et al., 1999, Fitzgerald et al., 2007), including the pediatric intensive care unit (Hedayat, 2008a, Headayat, 2008c), and may serve as an adjunct to the patient's medical care regimen (Hedayat, 2008a, Hedayat, 2008c). Medical aromatherapy has also been shown to be beneficial in other areas of hospital care, such as in the neonatal intensive care unit, for apnea and bradycardia (Marlier, Gaugler, & Messer, 2005). In addition, it has been shown to be effective in milder clinical conditions in adults and children, such as menstrual discomfort (Han, Hur, Buckle, Choi, & Lee, 2006), functional dyspepsia (Madisch, Heydenreich, Wieland, Hufnagel,

& Hotz, 1999), and irritable bowel syndrome (Kline, Kline, Di Palma, & Barbero, 2001). Therefore, our purpose was to extend this line of research into the pre-operative holding area to examine relationships between essential oil inhalation and anxiety in young children.

Child life specialists have a unique opportunity to work with patients to address the psychosocial factors that induce anxiety with respect to medical procedures. Blowing bubbles is part of the coping and distraction repertoire of child life specialists, yet to date there has been very minimal literature that has focused on the effects of aromatherapy on pediatric patients. We were very interested in finding out what possible effects aromatherapy could have on patients and their level of coping. One aim of this study was to determine the feasibility of using a bubble solution infused with essential oils in the pre-surgery setting. Another aim was to test whether the different types of bubbles would have different effects on anxiety. We hypothesized that the bubbles infused with essential oils would have a greater effect on reducing patients' anxiety levels and increasing coping compared to the unscented bubbles.

# METHODS AND PROCEDURES SITE AND PARTICIPANTS

This feasibility study was conducted at a single free-standing children's hospital in the Midwest region of the United States. In 2012, 17,000 surgeries were performed at this hospital, approximately 354 per week. The majority of surgeries are day surgeries that include tonsillectomy, adenoidectomy, myringotomy with tube insertion, and urological and ophthalmology procedures.

A total of fifty children participated in this study. All participants were between 3 and 11 years old at the time of participation in the study, spoke English as their primary language, and were admitted to the presurgical area for outpatient tonsillectomy, adenoidectomy, myringotomy and tubes, or an ophthalmology procedure. Children with a history of chronic rhinitis, rhinoplasty, anosmia, or Kalman's syndrome were excluded from this study because of their possibly reduced ability to detect scents. Written informed consent from each patient's parent and verbal assent from the patient were obtained prior to enrollment in the study. This study was approved by the Institutional Review Board at the research site.

#### STUDY DESIGN

A block-randomized design was used for this study, as our central research question revolved around intervention-based group differences. In this particular design, participants are randomly assigned to a control group that receives standard care (unscented bubbles), or to an experimental group that receives the research intervention (bubbles infused with essential oils). Participants were unaware of which group they were randomized into and which intervention they would receive.

# Measures m-YPAS

The modified Yale Preoperative Anxiety Scale (m-YPAS; Kain, et al., 1997) was the validated measure to use to assess and record participant anxiety levels during pre-operative admission. The m-YPAS consists of five categories: activity, vocalizations, emotional expressivity, state of apparent arousal, and use of parents. Each category has descriptions of behaviors escalating from calm to upset as the scores increase; the vocalizations category has six levels, while the other have four. For example, a score of one in the emotional expressivity category indicates that the participant is "manifestly happy, smiling or concentrating on play". A score of four in that same category indicates that the participant is "distressed, crying, extreme upset, may have wide eyes". Therefore, the higher the number scored indicates a higher level of perceived anxiety. The m-YPAS was completed a total of three times; twice in the pre-surgery holding area and once in the operating room.

## **PARENT SURVEY**

Parents were asked to rate their children's level of anxiety using a survey designed for this study (see Appendix). The survey consisted of three questions concerning the child's level of calmness when he or she first entered the outpatient surgery holding area; the child's level of calmness after their child participated in the pre-surgery medical play, preparation, and bubbles; and whether parents were present in the operating room with the child during the induction of anesthesia. A space for parents' comments was also provided. Although the comments were anecdotal in nature, they provided insight on families' experiences of participating in the study and using bubbles as a means for reducing anxiety in the pre-surgical area.

#### **PROCEDURE**

Both the control and intervention groups were provided with pre-surgery preparation by a Certified Child Life Specialist (the principal investigator [PI]). Preparation included looking at a surgery preparation book containing pictures of the hospital lobby, the surgical intake unit, the pre-surgery holding areas, an operating room, the recovery room, the 23-hour short stay surgical observation unit, the waiting rooms, an inpatient room, and the procedure suite. The surgery preparation book also showed participants pictures of the pre and post-surgery medical equipment they would encounter including a stethoscope, blood pressure cuff, thermometer, pulse oximeter, cardiac leads, and an IV catheter with saline bag and tubing. Participants were also given the opportunity to explore and manipulate the real pre-and post-surgery medical equipment.

The control group received standard bubbles, and the intervention group received essential oil-infused bubbles. Three widely available and extensively researched essential oils were chosen for this study.

Both groups were given a bottle of bubbles to blow for five minutes after pre-surgery preparation and medical play. The PI stayed in the pre-surgery room and engaged the participants in play with the bubbles. The PI used a stopwatch to accurately document how long each participant blew the bubbles. Participants were allowed to blow the bubbles for as long as they desired; however, five minutes was the minimum amount of time participants needed to blow the bubbles to expect a perceived effect, and all participants were able to remain engaged with the bubbles for the required time. The control group received standard bubbles, and the intervention group received essential oil-infused bubbles. Three widely available and extensively researched essential oils were chosen for this study. Lavender (Lavandula angustafolia) has been shown to reduce anxiety and has

benzodiazepine-like activity which reduces pituitary level stimulation of the adrenal gland, thus reducing the physiologic and neurologic basis of anxiety and fear (Hedayat, 2008a). Roman Chamomile (Anthemis nobilis) promotes a state of calm focus as indicated by augmentation of alpha waves on EEG (Masago et al., 2000). Sandalwood (Santalum album) is considered to be sympatholytic, reducing the fight or flight feeling in the brain, and also induces a calm and focused state of mind (Hongratanaworakit et al., 2004). One of the authors (KMH) has found in clinical practice that combinations of oils act synergistically by addressing multiple neuro-endocrine mechanisms of action and regulation. For the intervention group, Lavender, Roman Chamomile, and Sandalwood essential oils were combined in each bottle. The oils used were manufactured and supplied by an independent aromatherapy company owned by one of the study authors. This author was not directly involved with the implementation of the research.

Approximately one hour before surgery the PI determined each patient's eligibility to participate in the study based on the inclusion and exclusion criteria, and written consent was signed by the parent. Once consent was given, the participant's baseline anxiety levels were rated at three different points: (1) the pre-surgery nurse completed the first m-YPAS in the pre-surgery holding area after completing vital signs; (2) the same nurse scored a second m-YPAS after the PI engaged the participant in medical play and after the participant blew bubbles for at least five minutes; and (3) the third m-YPAS was completed by a research assistant who accompanied the participant into the operating room to evaluate the participant's level of coping during induction.

Once the participants had transitioned from the pre-surgery holding area to the operating room, the PI escorted the family to the surgery waiting room to check in. At that time, the PI gave the family the parent survey to complete and return to PI in a sealed envelope.

#### RESULTS

Our sample consisted of 25 participants who used the aromatherapy bubbles and 25 participants who used unscented bubbles. Of the group of participants who used aromatherapy bubbles, there were 15

continued from Focus page 3

females and 10 males. Of the group of participants who used unscented bubbles, there were 11 females and 14 males. There was no significant difference in gender in the two groups ( $X^2(1)=1.25$ , p<.0.72). Of the participants using the aromatherapy bubbles, 21 had tonsillectomy, adenoidectomy, and/or myringotomy and tubes and four participants had an ophthalmology procedure. Among participants using unscented bubbles, 20 participants had a tonsillectomy, adenoidectomy, and/or myringotomy and tubes, while five patients had an ophthalmology procedure. Again, there were no significant differences between groups  $(X^{2}(1)=0.136, p<.0.71)$ . The average age in the aromatherapy bubbles group was 6.5 years, with a standard deviation of 2.2. The average age in the unscented bubbles group was 5.8 years, with a standard deviation of 1.3. There was no significant difference in age (U=265, p=.36). There were also no significant differences in versed given or having a parent in the operating room.

## **F**EASIBILITY

We wanted to explore the feasibility of using bubbles infused with essential oils in the pre-surgery setting. Comments from the parent survey data are presented in Table 1. Parents felt the bubbles were a great distraction and something fun for their child to focus on while waiting for surgery.

Both the experimental and control groups appeared to benefit and experience a positive outcome from the intervention that they experienced. Participants using both types of bubbles displayed a lower level of anxiety after blowing bubbles and engaging in a medical play session. A Friedman test of repeated measures was run on the m-YPAS data for both groups. Both the aromatherapy group ( $X^2(2)=17.77$ , p<.001) and the unscented bubbles group ( $X^2(2)=15.26$ , p<.001) showed significant differences over time (see Table 2).

# AROMATHERAPY VS. UNSCENTED BUBBLES

The groups (aromatherapy bubbles vs. unscented bubbles) were compared to see if there was a difference in

Table 1. Frequency of Parent Comments				
	AROMATHERAPY GROUP	Unscented Group		
Great/engaging distraction, fun for all of us to play and relax	4	7		
Patient liked the Child Life Specialist	3	1		
Patient was in a better mood afterwards		1		
Helped patient become comfortable in environment		1		
Bubbles were a fun distraction, but he didn't like the smell	1			

the time bubbles were blown. There was no significant difference; median time for both groups was 7.5 minutes (U=294, p=.72).

A Mann Whitney U test was conducted to compare parent survey data for the two groups (aromatherapy bubbles vs. unscented bubbles). There were no significant differences between the groups in parents' perceptions of their children's levels of anxiety before (question 1 [U=308.50, p=.94]) and after (question 2 [U=305.50, p=.89]) the intervention.

A Mann Whitney U test was conducted to compare m-YPAS data for the two groups (aromatherapy bubbles vs. unscented bubbles) at the three measurements. There were no significant differences in m-YPAS scores between the groups at any of the three points in time (upon entry into presurgery [U=339.50, p=.53]), after bubbles and medical play [U=372.50, p=.95], and at anesthesia induction [U=329.00, p=.42]).

# **D**ISCUSSION

**Unscented Bubbles** 

From this study, we determined that it is feasible to introduce essential oil-infused bubbles as a means of enhanced distraction for patients in a pre-surgery setting prior to elective surgical procedures.

We hypothesized that in a medical setting of patients having elective surgery, the essential oils in the intervention therapy would be sufficiently anxiolytic and produce

statistically significant reductions in anxiety scores as determined by m-YPAS testing. This hypothesis was not supported by the data. There are a number of possible reasons why the hypothesis was not supported. This was primarily a feasibility study; the small sample size may have influenced our ability to determine statistically significant changes in anxiety levels. It is also possible that the act of simply taking deep breaths and blowing bubbles of either type assisted in reducing the participants' level of anxiety, and therefore the act of blowing bubbles had more of an

effect than the type of bubbles.

Studies showing a positive effect of essential oils with adults have used inhalation protocols as long as twenty minutes, while the children in this study averaged 8.37 minutes blowing bubbles. The longer time may improve the relaxation effects, but may not be practical in young patients who are easily distracted and cannot stay on task for extended periods of time. Finally, it is possible that a different combination of essential oils or a different ratio of the essential oils than those chosen for the study may have been more physiologically impactful.

One possible flaw in this study is due to our setting. Prior to surgery, patients and families wait together in the pre-surgery holding area in private, individual rooms. Although the bubbles infused with essential oils were not perceived by the PI to have an overwhelming or strong scent, any individual walking into the pre-surgery room after a participant had blown bubbles might be able to detect the scent of the bubbles. Because there was the possibility that the pre-surgery nurses completing the m-YPAS might be able to discriminate which type of bubbles each child had used, we were unable to meet conditions that would have made this a double-blinded study.

Another challenge of this study was the difficulty in determining the exact impact of

the bubbles on the participants' levels of anxiety due to the likely influence of other factors, such as the child life specialist engaging the participants in a medical play session and preparation.

	Time 1 Upon entering Pre-Surgery	TIME 2 AFTER MEDICAL PLAY AND BUBBLES	Time 3 Anesthesia Induction
Aromatherapy Bubbles	6	5	6

5

6

8

TABLE 2. MEDIAN M-YPAS SCORES

## **C**ONCLUSIONS

This study demonstrates that aromatherapy bubbles can be incorporated into the presurgery environment and into the child life specialist's plan of care. The program was well-received by participants and families as recorded in numerous parents' subjective evaluations and based on verbal statements of appreciation from participants and staff that were shared with the PI. By providing participants and families with the aromatherapy bubbles as a tool to use in the pre-surgery holding area, it is possible that the entire hospital experience can be enhanced in a positive way. Aromatherapy bubbles can be another tool that can be used to help patients to feel more relaxed in a hospital or clinic setting. Some patients may benefit from being given an olfactory choice when nothing else seems to help them. Child life specialists may be able to provide a greater level of service and additional options for patients by incorporating aromatherapy bubbles into their standard of care. Although this feasibility study was conducted within a large single free-standing children's hospital, it is our belief that child life specialists in various medical and alternative settings can successfully incorporate essential oils into their practice.

Part of the key to our success in implementing this research was discussion and planning with, and support from, the anesthesiologists and the pre-surgery nurses. Since the conclusion of our study, staff members from other clinics and areas of the hospital have asked the PI how they can incorporate aromatherapy bubbles into practice. The interest in using aromatherapy bubbles has grown hospital-wide.

Future research is warranted, not only because of the interest this study generated, but also to gain more information about populations that may be more likely to benefit from aromatherapy bubbles. For example, children who have a chronic condition and who are already displaying signs of anxiety and stress may benefit from multiple modes of relaxation; essential oil-infused bubbles may be tested with this group.

As noted in the discussion, future studies involving a larger patient population may yield a statistically significant outcome; alternatively, studying patients with pre-existing anxiety and who may experience a greater anticipated effect from the intervention

may allow for a smaller pilot study to be conducted.

In conclusion, although we were not able to show a statistically significant difference in anxiety between the essential oil and plain bubbles groups, blowing bubbles remains an intervention for child life specialists to use in helping children cope with anxiety prior to surgical procedures.

#### **A**CKNOWLEDGMENTS

We would like to thank Elaine Graf and the Shaw Nursing and Allied Health Research Grant Program for funding this research project. Thank you to Dr. David Steinhorn, Dr. Hawke Yoon, Dr. Dawn Belvis, Dr. Carmen Simion, and Dr. Sheila Wang for all of their continued support of this research and aromatherapy interventions. Thank you to Tamara Baloun and Susan Ruohonen for their encouragement and support throughout this process. A special thank you to the child life specialists involved in this study including Geanine Hunt, Emily Rogers, Rebecca Meyers, Julie Pierami, and Moira Arndts. Thank you to Marjorie Sasso, Victoria Storm, and all of the pre-surgery nurses who supported this research study.

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#### **APPENDIX: PARENT/GUARDIAN SURVEY**

1. How would you rate your child's level of calmness when you first entered the outpatient surgery holding area?

0 ------5

No anxiety Extremely anxious

How would you rate your child's level of calmness after receiving pre-surgery medical play, preparation and bubbles in the outpatient surgery holding area?

0 ------5

No anxiety Extremely anxious

3. Were you able to accompany your child into the operating room to be present during the induction of anesthesia?

YES NO

Comments:

# **Frequently Asked Research Questions**

**CLC Research and Scholarship Committee** 

#### **Principal Authors**

Emily Carlton, CCLS Alison Chrisler, MA, CCLS Peggy O. Jessee, PhD, CCLS Caitlin Koch, MS, CCLS Tori Levine, MEd, CCLS Jennifer Staab, MS, CCLS

Ithough child life specialists are integral members of the healthcare team and are essential to providing high quality pediatric care, there is a need for additional research that validates the effectiveness of child life interventions. The child life field is broad and many child life specialists are working in academia, non-profits, hospitals, and community organizations. Because research can be theoretical, clinical, or community-based, child life specialists have a unique opportunity to engage in many forms of research. In collaboration with Focus, the Research and Scholarship Committee, co-chaired by Kathryn Cantrell, MA, CCLS and Alison Chrisler, MA, CCLS, has outlined commonly asked questions child

life specialists have about developing and/ or partaking in research. We hope that our responses to these questions will demystify the research process and empower child life specialists to participate in research collaborations with other professionals.

# 1. WHAT CLASSIFIES AS "RESEARCH?"

The goal of research is commonly understood to be the systematic study of objects, people, institutions, or any phenomenon in order to create new knowledge and draw conclusions about the subject being studied. To be classified as research, the project should involve a singular or set of hypotheses about the subject matter. It should involve systematic data collection that adheres to a strict set of rules stipulated by the primary investigator. Finally, there should be conclusions drawn from the analysis of the data obtained. All research projects should be approved by the Institutional Review Board (IRB) in order to ethically carry out data collection and analysis. For more information on the IRB, please refer to question 7.

# 2. What's the difference between research and quality improvement?

The most basic differentiation between quality improvement (QI) and research is that QI is aimed at improving internal processes while the goal of conducting research is to generate more generalizable knowledge for broader application. In addition to variance in goals, the processes involved in quality improvement work versus research are also very different. Approval from Institutional Review Board (IRB) is necessary to conduct research, but approval is not needed for quality improvement work. Quality improvement work involves a small test of change designed to bring about swift improvement, while research involves systematic methodology, rigorous data collection, and statistical analysis. A quality improvement project may trial a change with two patients before deciding to adopt or adapt the process, while a research project must follow the research protocol meticulously. If changes to the protocol are needed the researcher must submit the change as an addendum to the IRB, which must be approved.

## 3. How do I fit research into my ALREADY BUSY SCHEDULE?

This is one of the top concerns of child life professionals interested in conducting research. First, the child life specialist should discuss research interests with his/ her supervisor. During this meeting the researcher should be prepared to propose a brief summary of the purpose, methods, and planned time frame of the study. The researcher should make sure to highlight how the research findings will benefit the department/profession and be able to advocate for protected research time. If this does not appear to be an option, the researcher may propose pursuing grant funding. Grants can provide funding for protected time or a research assistant to help with the research project. The researcher may work with the hospital's development department to determine appropriate grant sources. Governmental grants can be hard to obtain, but there are often foundations that are interested in funding a research project. In addition, it may be possible to obtain resources available at the hospital. Many hospitals and institutions provide research support for staff. If the researcher is conducting a literature review, contacting the hospital's librarian for assistance can prove helpful. Another possibility is to form a research committee; splitting up the work among colleagues can help alleviate some of the burden of forming and conducting a research study.

# 4. ARE THERE DIFFERENT KINDS OF RESEARCH MODELS AND IF SO, WHAT ARE THEY?

Generally, the three kinds of research models are quantitative research, qualitative research, and action research. The goal of quantitative research is to predict, control, describe, and confirm. This approach is guided by a hypothesis/hypotheses or research question(s) and is used to discover relationships and determine significant differences. Quantitative research can take the form of a study that is experimental, correlational, or causal. The data are generally collected from questionnaires, surveys, observations, or measurements that are numerical and are manipulated by statistical tests.

The goal of qualitative research is to understand, describe, or discover situations or phenomenon. Qualitative studies might also be used to generate a hypothesis or theory. This approach is used to gain in-depth knowledge,

answer questions, and gather opinions and attitudes. The methods employed to collect these data might include surveys, questionnaires, observations, or interviews. Generally, this type of research is guided by a research question, but no hypothesis is needed. Instead of numerical data, the data tend to be more narrative. These data are more appropriate for categorization or to be evaluated for themes or patterns.

The goal of action research is to assess, correct, improve, and change. This approach is used to improve operations or solve everyday problems using both qualitative and quantitative data. This type of research is conducted in classrooms, clinical settings, and business offices. Action research is guided by a hypothesis, a research question, or both. The data collected might be numeric, narrative, or a combination of both.

# 5. Can I just have a research question or do I need a hypothesis?

As noted in Question 4, quantitative research must have a hypothesis and may also have a research question. Qualitative research, however, requires a research question without, necessarily, a hypothesis. Action research may have either a hypothesis or research question or both.

Generally, a research question must be focused enough to guide the research and it must align with the stated purpose of the research. A hypothesis, however, tends to be based on previous research or a theory, which requires a literature review. Additionally, a hypothesis predicts a reasonable outcome that can be tested, states the expected relationship between variables, defines those variables in ways that can be measured, and is testable by collecting and analyzing data.

## 6. How many subjects do I need to make a research study possible?

This is a tricky question because there is no set requirement for the number of participants necessary for a research study. The number of participants depends on the type of study being conducted. In a quantitative study, the "n" (the number of subjects in the sample) of the study depends on the size of the population from which the sample is to be derived, the margin of error, and the confidence interval. Additionally, when more complicated statistical analyses are to be used, those models might require a larger sample size in order to achieve an effect size.

When possible, consult with a statistician at the beginning of the research project to help determine an appropriate sample size and develop a data analysis plan. There are useful sample and effect size calculators available online, such as the one that is available on the U.S. Department of Health and Human Services, Health Resources and Services Administration website (http://bphc.hrsa.gov/policiesregulations/performancemeasures/patientsurvey/calculating.html).

# 7. What exactly is an IRB, when do I need it, and what do I need in order to submit to an IRB?

An Institutional Review Board (IRB) is a group of individuals within a university, hospital, or other institution or organization that reviews and oversees research studies that involves human participants. The purpose of an IRB is to ensure that researchers are engaging in ethical research that does not compromise the rights of human participants in research studies. Federal law requires that before a study can begin, a researcher must submit his/her research study to the IRB. The IRB then reviews the application and either approves, asks for revisions, or disapproves of the research project. Additionally, before the IRB submission, all individuals who will interact with the human participants during the duration of the study have to complete human subject research training.

Institutional Review Boards vary by organization, but generally, an IRB application requires the following information:

- A detailed description of the research study, including purpose of the research, research questions, target population, participant risks and benefits, and how subject confidentiality and privacy will be maintained
- Any survey, questionnaire, observation protocol, or interview questions that will be used
- Any materials used to recruit participants to the study
- Participant consent documents

The researcher should consult his/her organization or institution for additional information concerning specific IRB submission guidelines and human subject research training requirements.

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#### 8. I COLLECTED DATA WITHOUT IRB AP-PROVAL! WHAT SHOULD I DO NOW?

If data have been collected data without prior IRB approval, it is imperative that the project be reported to the IRB at the researcher's institution or organization immediately. If the study is ongoing, the researcher must cease any interaction with human participants until the IRB has reviewed and approved all study procedures. If the institution does not have IRB, please contact a private IRB organization.

If a study is completed for program improvement purposes and the intent of the study was not for "research," IRB approval is not required. However, if the researcher wants to present the findings from this program improvement study in a journal or conference, IRB approval is needed. In addition, if data were collected for non-research purposes but the researcher now wants to use the data for research, IRB approval is required.

# 9. How do I get help getting my data analyzed?

First, consider whether the research data is quantitative or qualitative. Generally, quantitative data are expressed by numerical values. In contrast, qualitative data are typically descriptive and not in numerical form. Once the type of data being analyzed is determined, the next step might be to connect with the research department within the researcher's institution. There are typically staff members and resources within that department that can help with this process. They use specific computer programs or outside agencies to assist with data analysis. In situations where these resources are not available, analyzing research is still possible. Consider partnering with colleagues who understand the research project and can offer support. Depending on the sample size and the amount of data that needs to be analyzed, the workload is often more than one person can manage in addition to daily responsibilities as a child life specialist. Consider reaching out to other disciplines, such nurses, social workers, or physicians. Also, network with other professionals and explore the Internet for data analysis options. There are affordable programs and private companies available to assist with both quantitative and qualitative research data analysis.

# 10. What avenues are available to get information generated by research to the public?

The dissemination of results is a key step in the research process. Depending on the type of audience that the research aims to target, various dissemination activities might be used. In academia, the most common form of dissemination is publishing research findings a peer-reviewed journal. The review process can be tedious and time consuming and can result in a submission being accepted as is, accepted with revisions, or rejected. Advocacy and non-profit organizations might publish reports or briefs that are made available online to the public. This type of publishing is done internally and does not go through a formal review process by an outside organization. Conference publication is another avenue to pursue when considering where to publish research. This might including presenting the study findings in a lecture/ workshop or poster presentation format.

# **ADDITIONAL RESOURCES**

## **QUALITY IMPROVEMENT**

Shirely, M.R., Hauck, S.L., Embree, J.L., Kinner, T.J., Scharr, G.L., Phillips, L.A., Ashby, S.R., Swenty, C.F., & McCool, I.A. (2011). Showcasing differences between quality improvement, evidence-based practice, and research. *Journal of Continuing Education Nursing*, 42, 57-68.

# CALCULATING SAMPLE SIZE

U.S. Department of Health and Human Services, Health Resources and Services Administration, Primary Care: The Health Center Program http://bphc.hrsa. gov/policiesregulations/performancemeasures/ patientsurvey/calculating.html

# Jazzin' It Up: Big Ideas in the Big Easy

ore than 1,000 child life professionals, students, and educators will gather in New Orleans, Louisiana, to attend CLC's 32nd Annual Conference on Professional Issues. Steps away from the historic French Quarter and iconic Jackson Square, attendees will select from a variety of professional development workshops and opportunities to network. CLC invites you to join the largest annual gathering of child life specialists in the world to share *Big Ideas in the Big Easy*. The conference will take place from Thursday to Sunday, May 22-25, 2014 at the Hilton New Orleans Riverside Hotel.

We are proud to bring back as our Emma Plank Keynote Speaker Garry L. Landreth, LPC, RPT-S, internationally recognized for his writings and work in promoting the development of child-centered play therapy. He is a Regents Professor in the Department of Counseling and founder of the Center for Play Therapy at the University of North Texas.

Here are a few of the exciting things that will be happening at CLC's 2014 Annual Conference:

- An array of Half-Day and Full Day Intensives, including multiple Half-Day Intensives offered on Saturday, May 24
- The Connect 4 Success networking event has received a makeover! It will be held on Thursday, May 22
- Two Hospital tours Tulane Hospital for Children and Ochsner Medical Center for Children
- Extended Exhibit hours on Saturday, May 24 will offer attendees more time to learn

about relevant products and services

 Again this year, an electronic quiz offered after the conference will allow participants to earn PDU credit for attending poster sessions

The full conference program with more information about these and other conference events will be available on the CLC conference app and website soon. Please visit the Annual Conference section of the CLC website at www.childlife.org to download an electronic version of the program plan and the CLC conference app, access information about registration, and make hotel reservations at the special CLC conference rate of \$154 per night for a single/double room. To ensure room availability at the Hilton New Orleans Riverside Hotel, we encourage you to make your hotel reservations early!

# Play Maps and Life Lines

continued from page 6

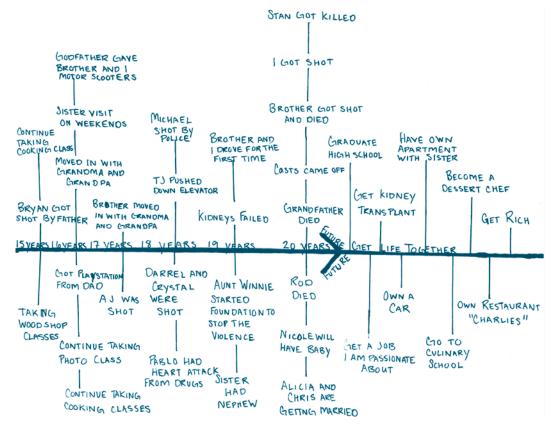
in the conversations with family members and patients; in connections to previously unforeseen strengths; in newfound hope and mutual appreciation where there was only tension before; in helping someone find a narrative, visual or in words, to tell their story. It is often simply in the witnessing. I have often seen our role as exactly that, to be "a witness in the silences when words are not enough" (Field, Pool, VanManen, & Riekerk, 1999).

# REFERENCES

Field, P., Pool, H., VanManen, R., & Riekerk, R. T. (1999). Testify to love. [Recorded by Avalon]. On *Avalon Live in Concert — Testify to Love* (DVD). Nashville, TN: Sparrow Records. (Recording date 2003).

Gregg, S. G. (2002). Heartlines and lifelines: Narrative reconstruction to

aid dollhouse play. In H. Kaduson & C. Schaefer (Eds.) 101 favorite play techniques. Lanham, MD: Rowman & Littlefield. McLaughlin, G. B. (2010, December 10). Play memories. Retrieved from http://www.empoweredbyplay. org/2010/12/play-memories/



SAMPLE LIFE LINE

#### LIFE LINES

The Life Line is a drawing technique to help teens express and reflect upon who they are, what they've been through and how they've coped. It is best used with a teen-aged child, as abstract thinking is a necessary component for this activity. This project can be used over a period of time, or used in one session to build rapport and connection (Gregg, 2002).

#### **M**ATERIALS

- Paper
- · Pencil/Pen
- Crayons/Markers/Water color pencils/Paint

#### Instructions

Instruct teen to draw a long horizontal line with an arrow on the right side end of it, pointing to the right. Explain that this is a timeline representing his/her life. The left-most point represents their birth. The arrow represents their future. The teen writes on the life line important things that happened during his/her life. If the teen is able, s/he should write dates or the age s/he was when the event occurred. Illustrations may be used in place of words.

If the teen has a hard time getting started, suggest that s/he think about things that happened that were difficult, exciting, new, good or bad, or that changed his/her life at the time. Try not to prompt too much, but if the teen still struggles, say, "Some people write down stuff like when their baby sister was born, when they moved, started or changed schools, when parents got a divorce, if someone died, if they got sick or hurt...".

If time allows, or at another session, they can pick any item from the Life Line, and draw/paint a picture about it. At the end, they will have a book about their life, and there will be a lot to discuss and reflect upon.

It is the conversation that occurs during this activity and the process of the activity, rather than the finished product, that is meaningful and healing. If hardships are depicted, you can ask open-ended questions about what helped the teen through those times, what they leaned on, and what they learned about themselves that they can apply to present or future hardships.

Introduce and facilitate the same activity with the teen's caregiver. Facilitate a joint session where they compare Life Lines. This can be a healing and connecting experience for all.

The comparison and conversations around their Life Lines should be couched in the explanation that often parents and teens see the world through different lenses, and that differences are common. Discussing the differences, as well as discovering commonalities and shared challenges, can foster understanding and empathy.

# **Let's Play: Effective Playroom Programming**

Victoria White, MS, CCLS, Primary Children's Hospital, Salt Lake City, UT

ew research studies have explored hospital playroom environments, but we all have an opportunity to evaluate our programs and share ideas to ensure that we are providing the best services possible for patients and siblings. This is especially important during healthcare reform and the drive for best practices that include quality, efficiency, and accountability. Part of this process requires collaboration between child life programs to share best play programming practices with one another, specifically as they relate to our playroom settings, visions, populations, staffing, and policies. Below I share some information about Primary Children's Hospital in the hopes of sharing some of our successes.

# **PLAYROOM SETTINGS**

The number and size of hospital play spaces is often unpredictable. There is no standard or recommendation for the amount of dedicated play space per patient bedroom. At Primary Children's Hospital, we have a 289 bed, freestanding children's hospital and we have one playroom. Space is limited so we are creative in using waiting rooms, lobbies, and classrooms when planning play-based events for our patients. Ideally, we would love to provide more dedicated play spaces for our patients, siblings, and visitors, but there is little evidence to support our requests to hospital administrators.

#### PLAYROOM VISION

Many different perspectives exist regarding what the vision of a hospital-based playroom should be. Is the vision to have an entertaining environment that is a distraction from hospitalization? Or is it to have a play-based clinical space for assessments and therapeutic interventions? My personal belief is that playrooms are a space we can all use to legitimize the work we do with patients and families. By creating a clinical vision for a playroom, we can utilize formal documentation of child life interventions to validate and advocate for the many benefits of play during hospitalization.

# **PLAYROOM PATIENT POPULATION**

Part of creating an effective playroom program for your hospital is understanding who is and is not utilizing the space. Our child life program collected data over a period of 30 days to investigate who specifically was utilizing the playroom space. Patients age, unit, number of siblings/visitors, siblings' ages, and number of adults accompanying a patient were tracked. In analyzing the data, we found that 70% of the population using our space were children ages 3-10. Interestingly, for every patient visit, there were two sibling visits. We gained great data to support the users of our space.

## **PLAYROOM STAFFING**

#### CHILD LIFE STAFF

At Primary Children's Hospital, the playroom staffing plan consists of seven day child life coverage for programming, group facilitations, assessments, and therapeutic interventions. We also have seven day coverage by volunteer coordinators who collaboratively supervise more than 350 volunteers per week in the playroom. This allows our program to meet more than 14,000 patient and family requests for play annually.

#### **V**OLUNTEERS

Because our volunteers are centrally located in the playroom, they can go where needed at any given moment. They are able to help with sorting donations, restocking playroom supplies, inviting patients and families to events or activities, and most importantly to our program—play. Volunteers are trained in infection control policies and are able to do all hospital toy cleaning, which only amounts to 20 minutes of their 3 hour shifts. We want them to spend their time interacting with patients and families in the playroom, bedrooms, and clinics.

#### PLAYROOM POLICIES

One unique thing about the playroom at Primary Children's Hospital is that we allow all healthy siblings and visitors to play in the same space as patients, including the siblings of patients on isolation precautions. Our infection control team has found no data to suggest that there are increased infections, which we attribute to having proactive hand hygiene practices in place as well as daily cleaning of all playroom toys by volunteers.

# **PLAYROOM RESOURCES**

The child life program at Primary

Children's Hospital is committed to fostering community relationships to help provide supplies and to encourage participation in special playroom activities. We collaborate with our hospital's public relation department to use social media to share our needs and have donation needs listed on the hospital webpage. We have a target goal of spending \$1 per therapeutic activity per patient. This helps us be creative in using loose parts and items that may be unconventional. We continually strive to create new ideas for community programs in our playroom as well. Recent activities have included chemistry clubs doing science shows on our CCTV, Home Depot Kids Workshops, local police departments, master gardeners, and special guests to cohost hospital bingo on Wednesdays.

# HEALTH CARE REFORM AND OUR PLAYROOM

We know that health care is changing and we need to look ahead and anticipate how we need to adapt our playroom programs. Patients who are currently being admitted for brief stays will be transitioned to outpatient ambulatory care. This means that our hospitalized patients will be sicker and less mobile in the future, though our sibling population will remain the same. In anticipation of this, we have made all areas of our playroom accessible for a patient bed, we have dedicated space for medical play due to the increase in medical complexities, and we have begun transforming our CCTV programs to be more frequent and more interactive to accommodate the increase in patients being on isolation or unable to come to the playroom.

# **C**onclusions

As we begin to open the dialogue about playroom programming, we aim to develop best practice standards nationally through idea sharing and collaboration. By collaborating with each other we can better meet the needs of current and future patients and families who are utilizing our play spaces. By developing best playroom practices we can better advocate for future expansions and elevate the work we do in providing play opportunities to our patients and families.

# **Playrooms in North America**

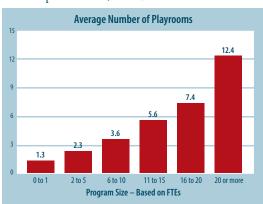
Deborah B. Vilas, MS, CCLS, LMSW, Bank Street College of Education

#### **I**NTRODUCTION

As part of the Advancing the Field of Play for Hospitalized Children Initiative supported through a grant from Disney, the Child Life Council conducted a survey examining the state of play in hospitals throughout North America. The survey examined many topics, including play space, tools and equipment, programming, policies, staff training and skills, innovations, and how programs would like to improve their ability to provide play to children in their care. A total of 464 programs were contacted and 181 (39%) participated in the survey. This article will highlight what we discovered about playroom set up and programming. Visit the CLC website at http:// www.childlife.org/files/ReportPlayPracticesInnovationsSurvey.pdf for the full report.

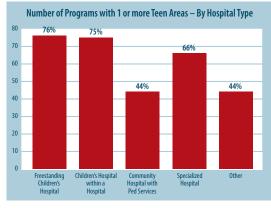
## PLAY SPACE:

• The 181 programs have 451 playrooms. 348 are located on inpatient units, 86 in outpatient units, and 17 off unit.



- A third of all playrooms are open 24 hours a day, seven days a week; 28% are open 40-60 hours a week; and 16% are open 21-39 hours a week. 50% of playrooms are open at off hours.
- Three quarters of playrooms are small (100-400 square feet) or medium sized (500-999 square feet). 60% of all playrooms have storage space.
- In the past two years, over a quarter of programs have lost either playroom or storage footage.
- Over half of playrooms have play areas divided by developmental stage.

• Only 39% of programs have a playroom or recreational space dedicated to teens.

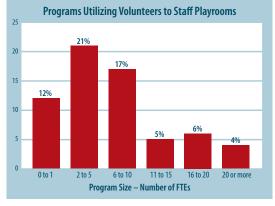


# STAFFING AND USE OF PLAY SPACE

- 64% of all playrooms are staffed by child life specialists, 65% are staffed by volunteers, 27% by child life assistants, and 25% by interns. A quarter of all playrooms are unstaffed.
  - Outdoor play areas are available in 38% of programs. Most of these areas are available when weather permits, while a handful of them (3.5%) are staffed.
  - Siblings are welcome in most playrooms, with only 10% of playrooms not allowing siblings. 42% require parental presence when siblings are in the playroom.
  - Psychiatric patients are not permitted playroom access in 18% of programs.

# **PLAYROOM PROGRAMMING**

 A wide assortment of play is offered in playrooms, including sensory, game, crafts,



expressive arts, constructive, loose parts, gross motor, child-centered, and medical play.

 Medical play is offered in 88% of playrooms and medical play groups are offered in 85% of playrooms.

### **POLICIES**

- 92% of playrooms use labeling of toys to deter theft, and 85% use locked storage. Other toy retention practices include a sign out sheet, toys available only when playroom is open, signage, direct supervision of toys, collection of toys at end of play session, lending guidelines, and wall mounted or land locked toys.
- 98% of programs have a written toy cleaning policy. 59% of programs clean toys after each patient use, 25% clean their toys daily, and 10% clean toys after each playroom session.

# AREAS FOR GROWTH AND FURTHER RESEARCH

At a time where child-centered, openended play is on the decline, child life specialists are called upon now more than ever to be leaders and advocates for developmentally appropriate and empowering play. The data from this survey points to many opportunities for program growth and topics for future research.

# Possible playroom IMPROVEMENTS

- Provide more play space (indoors and outdoors) for all patients and more designated space for teens.
- Expand opportunities for child-directed, open-ended play.
- Improve patient access to medical play materials in all playrooms.
  - Make more play groups available in playrooms in order to meet developmental needs and provide therapeutic interventions for more children.
  - Provide more training for staff and volunteers on toy choice and playroom design to insure best practice in meeting children's developmental needs.
  - Expand playroom opportunities for psychiatric patients and siblings.

continued on page 10

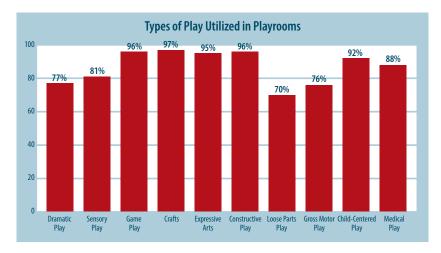
# **Playrooms Survey**

continued from page 9

- Provide aggression release toys and play for preschoolers and school aged children.
- Provide more training for child life staff in the value and use of such toys and interventions.

#### **A**REAS FOR FUTURE RESEARCH

- Further study of how staffing policies, training, and supervision affect what types of play are available to patients in playrooms.
- Exploration of staff views on and experience with aggressive release toys and play.
- Further investigation into which practices assist most in promoting toy retention and deterrence of theft.



- The influence of child life specialist run playrooms versus those staffed by volunteers/CLAs/and interns. What is the difference in the patient/child/sibling experience? How can this be measured?
- Research on how programs go about establishing procedure-free zones in their playrooms.

# V is for Volition

continued from page 1

child who is upset about a scary procedure in a novel environment, someone working to divert their attention may add another layer of stimulation, and also stress. In addition, not all procedural distress is due to the procedure itself, but to other factors not addressed by distraction, such as not being able to see what's going on or from having body parts exposed. In such cases, the distraction is additional "noise." Automatically providing distraction robs us of the opportunity to find out what is uniquely challenging to each patient and family at that time and to address those concerns appropriately.

Finally, the term "distraction" cheapens what we do as child life specialists. "Distraction" sounds like something that can be done by anyone with a bottle of bubbles or an iPad. Even a robot can "do distraction" (Beran, Ramirez-Serrano, Vanderkooi, & Kuhn, 2013). If we want our colleagues to respect our skills, we need to use language that accurately describes what we are capable of doing.

Using planned alternate focus employs the child's active volition, therefore empowering the child. The power that comes from choosing how and when to be supported engenders

mastery and ownership of the process of coping through a procedure. Some children may prefer to pay attention to the sequence and details of the event, and distraction would not serve them well. Others may want to attend elsewhere just during the hard parts, and some may prefer to fully engage in a different activity of their choice throughout the entire procedure. In each case, the child benefits from taking the lead in planning how to be supported.

Planned alternate focus takes more time than choosing an appropriate distraction item, but even with as little time as it takes for medical staff to prepare, a child life specialist can assess the child's knowledge and coping preferences for all or specific parts of the procedure, and what kind of diversional strategies they would prefer to use. With the luxury of time, extended psychological preparation and rehearsal of coping strategies are ideal.

The skill of a child life specialist isn't in choosing the best distraction objects, but in the flexibility with which we can use our presence and degree to which we can engage and support the child in a way that empowers them as the patient. Planned alternate focus employs our skills and empowers the children and families in our care, helping them to gain mastery that will serve them well in future challenges.

# REFERENCES

Beran, T. N., Ramirez-Serrano, A., Vanderkooi, O. G., & Kuhn, S. (2013). Reducing children's pain and distress towards flu vaccinations: A novel and effective application of humanoid robotics. *Vaccine*, *31*(25), 2272-2277.



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# RESEARCH CORNER

# Interview with Children's National Medical Center Research Team

Jennifer Staab, MS, CCLS, Children's Hospital Colorado

ast year the Child Life Council (CLC) received a \$300,000 grant from Disney to help advance the field of play. Part of the grant funding was used to commission a research project to evaluate whether play has an effect on recovery for hospitalized children. The CLC released a request for proposals (RFP) in March of 2013 to solicit proposals from potential researchers and institutions to conduct a study to help validate the efficacy of child life services to link child life intervention to decreased cost and/or improved outcomes for hospitalized children and their families.

Several proposals were reviewed by CLC's review committee, one of which was a five-year retrospective chart review evaluating child life intervention's effect on MRI sedation rates. Tracy Sharbaugh, Courtney Baines, and Erin Stanford are the child life specialists at Children's National Medical Center in Washington, DC who helped put together the research team and submit the winning proposal. We caught up with this research team to learn more about their experiences developing this proposal and conducting their research.

# Q: Why did you decide to apply to Child Life' Council's RFP for *The* Effectiveness of the Modality of Play on Recovery for Hospitalized Children?

A: We have been working on a non-sedate program called "MRI I Can Do It" since September 2011, and felt the RFP was a great fit for what we were already doing with this program and a great opportunity to share our findings.

# Q: Once you decided to apply for the grant what was the first step you took?

A: Once the RFP came out, our first step was to begin gathering information and garnering leadership support. An interdisciplinary team, consisting of child life specialists, managers, and the chief of radiology, had already been formed as part of the "MRI I Can Do It" program. This group then served as the

foundation of the research team. The chief of radiology was very supportive and helped match the child life team with an independent contractor who could help with the project as the project manager and statistician.

# Q: How did you develop your research question?

A: The research question developed itself as we began thinking through the expectations outlined in the RFP. Our research question was threefold: 1) What is the cost effectiveness of utilizing child life services in radiology for children undergoing MRI scans with and without sedation? 2) Does child life involvement increase patient and family satisfaction? 3) Does child life preparation and support improve patient safety? We had also recently presented findings from the "MRI I can Do It" program at the Society for Pediatric Radiology Conference, so this material was helpful in the development of the proposal.

# Q: What outcomes will the study look at? Why do you think the outcomes you selected are important?

A: Prior to the implementation of the "MRI I Can Do It" program, every child under the age of twelve was being sedated for MRI scans at our facility. We decided on a retrospective study that would compare children who did and did not go through the "MRI I can Do It" program. We hoped our outcomes would describe the benefits child life intervention might have for children, families, and the hospital. We

also planned to explore how child life intervention improved work flow and improved the overall experience of care for patients and families, while also showing that child life intervention can reduce the number of children sedated for MRIs, resulting in lower costs for the hospital.

# Q: How do you think the information obtained from the study will help the child life profession?

A: We hope that our work will inspire others to apply for grant funding and participate in research. We believe research is the future of our profession and hope our findings will be able to help child life departments confirm the economic value of the profession nationally and internationally. From a program improvement standpoint, we anticipate the data will encourage our radiology department to further use child life services to help decrease the number of children that require sedation to successfully complete an MRI, and other areas of the hospital will see the economic value of incorporating child life into programming.

# Q: Do you have plans for sharing the information you obtained from the study?

A: Our first goal is to finish a report for the Child Life Council in January, and then submit an abstract to the Society of Pediatric Radiology Conference. In addition, we are planning to submit an abstract to disseminate our findings at the Child Life Council's Annual Conference on Professional Issues and produce several manuscripts with the hopes of publishing the findings in a peer-reviewed journal.

Research Corner is a new Bulletin feature designed to highlight the process of research, as well as feature child life specialists involved in research projects. If you know of a person or project that could be featured in this space, let us know by emailing bulletin@childlife.org



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**ELECTRONIC SERVICE REQUESTED** 

VOLUME 32 • NUMBER 1 WINTER 2014

# **CLC Calendar**

#### **JANUARY 2014**

1-31 Start planning your Child Life Month events and activities for March!

- 1 Deadline for Bulletin and Focus articles for consideration in the Spring 2014 issue
- 31 Deadline for applications for the March 2014 computer-based Certification Exam Administration (January 15 for those educated outside of the U.S. or Canada)
- 31 Certification Maintenance Fees due

# MARCH

- 1-31 Celebrate Child Life Month!
- 15-30 Child Life Professional Exam administration testing window

# **APRIL**

1 Deadline for Bulletin and Focus articles for consideration in the Summer 2014 issue

## May

- 22-25 CLC 32nd Annual Conference on Professional Issues, New Orleans, Louisiana
- 25-27 CLC International Summit: The State of International Pediatric Psychosocial Services, New Orleans, Louisiana

# **2014 Oncology Nursing Conference**

April 13–14, 2014 The Ritz Carlton Hotel Cleveland, Ohio

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