Colorado Child Care Assessment:
Need for Nurse Consultation Services
1999

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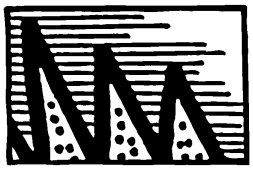

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I would also like to personally thank all the childcare providers who thoughtfully completed and returned the assessment.

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Background

With over sixty percent of Colorado families with children under the age of six in the work force, the childcare setting occupies a major position in the health, safety, and well being of Colorado's children. It is not unusual for childcare professionals to be confronted on a daily basis with any one of a number of health or safety issues regarding the children in their care.

Not only must providers address the myriad of childhood illnesses from pink eye to the common cold, they must also provide a safe and injury free environment, comply with immunization guidelines and OSHA regulations, provide proper nutrition, detect signs of abuse and neglect, confront behavioral and disciplinary issues, and care for children with special needs. Very few childcare centers are equipped with health care professionals who have expertise in these areas. Those that do not have expertise on site can benefit from consultation with a trained professional.

Recognizing the need for a more comprehensive approach to the integration of health and safety services in the childcare setting, the Healthy Child Care America Campaign was implemented. This initiative is a partnership between the American Academy of Pediatrics, the Maternal and Child Health Bureau, the U.S. Department of Health and Human Services and state health departments. The campaign's focus is the development by communities of health, safety, and support systems for local childcare settings. As part of the campaign, a Blueprint for Action for Health and Safety was developed that highlights the importance of nurse consultation services for childcare centers.

An average of six to ten hours of nurse consultation [is] associated with improved performance in health and safety in [childcare] centers.

In their ever-evolving multifaceted roles, public health nurses have become recognized as experts in child health and development as well as in community health. These combined competencies position public health nurses as ideally suited to work with childcare providers and the children and families they care for. Dr. Susan Aronson, in a 1990-92 study, demonstrated that an average of six to ten hours a year of nurse consultation was associated with improved performance in health and safety in centers.

The public health nurse consultant can provide guidance and technical assistance to childcare providers regarding the health and safety of children in their care. The consultant may provide phone consultation regarding sick children or on-site health supervision of children. Consultant activities may also include staff training, parent and child health education programs, assessment of health and safety practices, referral to other health professionals, staff physicals, review and development of policies and procedures, and maintenance of health records. Within the context of direct service provision and consultative support, the public health nurse can assure that:

- the childcare setting is a safe and healthful place to care for children
- childcare children and their families are linked to primary care providers
- childcare staff have adequate and appropriate health and safety training
- childcare centers comply with local, state, and federal regulations
- childcare families are linked with health and social and educational programs as needed
- quality nutrition is provided for children while in the care of center staff
- special needs children are identified, assessed and referred
- immunization and health records are maintained
- policies and procedures are in place and adhered to in order to maximize quality.

Rationale

Consistent with Healthy Child Care America Campaign's Blueprint for Action, a statewide assessment of childcare providers throughout Colorado was conducted during the summer of 1999. The intent of the assessment was to identify the specific needs of childcare providers with regard to nurse consultation services. Nurse childcare experts throughout the state were consulted regarding the conceptualization and design of the assessment

Local public health nurses are already called upon by many of their provider constituents to provide consultative services. They know that many others need and want their help. In order to target their efforts and ensure that all public health nurses are properly trained to respond to requests for advice and service, it is important to ask providers to define and prioritize their health and safety needs. The assessment information presented in this report can be used to design locally responsive systems throughout the state in which nurses can effectively partner with childcare providers in providing optimum health care services, training, administrative and referral services to childcare providers and their staff and families.

Methodology

An external program evaluator, in collaboration with program directors and selected public health nurses statewide, designed a two-page assessment tool. The assessment tool was distributed to all 1154 licensed childcare centers in Colorado. Childcare homes were not surveyed. Included with the tool was a letter of explanation asking providers to complete and return the survey in the enclosed stamped and addressed return envelope. As an incentive to complete and return the assessment, a ticket for a drawing for one of eight $25 food vouchers was also included. Completed assessments were mailed directly to the external evaluator who separated tickets and delivered them to program centers who conducted the drawing. Anonymity was guaranteed to all participants.

Prior to mailing the instrument, questions were converted to scannable format using Teleform software by Cardiff. Respondents were asked to completely fill in the circles of the answers they chose. Forms were scanned and verified using the software. Responses to close-ended questions were analyzed with Microsoft Access. Open-ended responses were entered into a Microsoft Excel database where they were coded and grouped thematically.

Of the 1154 Assessments sent, 74 were returned for wrong address or *No Longer at This Address*. Of the remaining 1080, 411 were returned by the deadline for an overall return rate 38 percent. This higher than average return for a mail out assessment is at least partially attributable to the incentive offered for its return.

Local public health nurses are already called upon by many of their childcare provider constituents to provide consultative services. They know that many others need and want their help.

In deference to anonymity, postmark or return address determined the geographic location from which completed assessments were obtained. Of the 411 completed returns, 347 or 84 percent came from urban areas including Denver Metro and Colorado Springs. Forty (10%) came from rural areas including Alamosa, Aspen, Durango, Glenwood Springs, Golden, Grand Junction, Greeley, La Jara, La Salle, Loveland, Minturn, Oak Creek, Olathe, Parachute, Rifle, Security, Steamboat, Salida, Sterling, and Woody Creek. For 24 assessments (6%,) no geographic identification was possible. The urban return rate was 39 percent (347/896), the rural return rate, 22 percent (40/184).

In addition to the provider assessment, five public health nurses from rural and urban communities were interviewed with respect to the need for childcare consultative services. These nurses described the childcare consultation in which they were already engaged and the need for additional services. They further elaborated on the value of relationship building with providers. Their perspectives are included in the segment of the report that describes current nurse childcare consultation utilization.

Results of the assessment are summarized in graphical displays on the subsequent pages of this report. Data have been stratified into rural and urban sub-categories for most data displays. Actual specific data tables are available upon request. Included in the Appendix is a copy of the assessment tool.

Findings

The actual findings of this evaluation are organized into six broad categories:

- Children and Staffing
- Need for Nurse Health Care Services
- Need for Nurse Consultation services
- Need for Family and Child Services
- Staff Training Needs
- Nurse Childcare Consultant Utilization

Children And Staffing

The childcare centers represented in this study care for infants through school age children. Most of the children in both rural and urban centers are pre-school age children. Centers in urban areas care for, on average, 21 to 40 preschoolers per day whereas rural sites generally have enrollments of less than 20 on average.

Toddlers comprise an average of 11 percent of the childcare population and infants, 6 percent despite their location. Those who care for infants generally have no more than 10 in their care on any one day, toddlers less than 20. Table 1. displays the relative distribution of children among rural and urban participant locations.

Table 1. Distribution of Children among Centers by Age Group

Age Group	Rural	Urban	All
Infants	6%	6%	6%
Toddlers	9%	11%	11%
Pre-school	48%	51%	51%
School Age	37%	32%	32%

Most frequent staffing categories among participant sites are consistent despite location. The most common childcare worker is a permanent part-time employee. Centers employ 1 to 10 permanent part-time staff on average. The next most frequent staff classification is that of permanent full-time employee. Smaller and rural centers employ 1 to 10 permanent full-time employees on average; larger urban centers average 11 to 20. Temporary employees are not common among the childcare centers that responded to this study.

Most of the children enrolled in both urban and rural centers are pre-school age children.

The most common childcare worker is a permanent part-time employee.

Need for Nurse Health Care Services

To better frame the need for nurse services, providers were asked to list the top three health and safety needs of the children in their care. Forty-three percent of all responses indicated that care of sick children, safety in general, and nutrition were prime needs. Next in importance regarding health and safety of children were immunizations and communicable diseases followed by screenings, staff physicals, child

behavior issues, and parent education. A complete prioritization is found in Figure 1. High priority needs are displayed in large fonts; lower priority needs in smaller fonts.

Figure 1. Childcare Provider Top Health and Safety Needs

Health/Safety Needs	
Care of Sick Children	
Safety	
Nutrition	
Immunizations	
Communicable Diseases	
Screenings	**Child Behavior**
Staff training	**Parent Education**
Abuse	**Well Child Checks**
Physicals	**Dental Health**
Hygiene	**Cleanliness**
Health/ Healthcare	**Medication Administration**

When childcare providers were asked to tell us in their own words *in what way a local public health nurse consultant could be of most help to them, their staff and the children and families they serve,* 99 percent wrote in some response. A summary of their responses is displayed in Figure 2. beginning with most frequent response at the top of the figure to least often at the bottom. The number one request for nurse health care services was for the provision of child health care on site. The most frequently identified type of health care service requested was for physical examinations (both child and employee). Other examples of needed services in order of frequency included immunizations, periodic visits, sick child assessment, TB skin tests, and medication administration.

The number one request for nurse health care services was for the provision of child health care on site.

Figure 2. How Public Health Nurses Can Be of Most Help to Childcare Providers

1. Provide health care services
2. Provide advice and information
3. Provide staff training
4. Perform screenings
5. Provide parent training and education
6. Review immunization and medical records
7. Provide referrals, help establish policies, meet government regulations

Listed in frequency from most to least requested

In addition to responding to an open-ended question regarding needs for nurse health care services, respondents were given a list of commonly provided or proposed nurse services and asked to rate them as *High, Medium*, or *Low* priority. Results are displayed in Table 2.

Table 2. Need for Nurse Health Care Services

Service	Rural	Urban	All
Staff Physicals	●	●	●
TB Skin Tests	●	●	●
Developmental Screening	●	●	●
Hearing and Vision	●	●	●
Hepatitis B Shots	●	●	●
Child Immunizations	●	●	●
Well Child Checks	●	●	●
Sick Child Assessment	◑	◑	◑
Dental Checks	○	◑	○
Medication Administration	○	○	○
Treatment for Injuries	○	◑	◑

● =high priority ◑ =medium priority ○ =low priority

Providers in both rural and urban areas rated seven out of the eleven services listed on the assessment question as a high priority. Included among the seven are: staff physicals, TB skin tests, developmental

screening, hearing and vision, hepatitis B shots, child immunizations, and well child checks. Sick child assessment and treatment for injuries were given medium priority overall, and dental checks and medication administration low priority overall.

Table 3. reflects the availability of on site sick care at childcare centers. Fewer than ten percent of respondent sites offer on-site sick care and less than thirty percent provide hearing and vision screening on site. This is consistent with the high prioritization of these services by providers.

Table 3. On-site Health Services

On-site Service	Rural	Urban	All
Sick Care*	6%	7%	7%
Hearing and Vision Screening	21%	30%	29%

*Primarily involves basic care or isolation until parent arrives

When sick care is provided on site it generally involves basic care until a parent arrives. One center mentioned that, although not currently providing sick care, *having researched it extensively* and another plans to offer sick care in the future. Another respondent commented that the center *does not provide sick care but parents think that we do*.

Hearing and vision screening is generally provided through a local college, volunteers, local health department, school district, hospital, or through Child Find. One site provides this service *only for special needs children*. Another described their screening as *by observation only*.

Need for Nurse Consultation Services

As reflected in Figure 2., the second most requested need for public health nurse services was for advice and information. Providers described the advice and information they referred to as including direct nurse consultation, answering health and safety questions, providing information to staff and parents, phone consultation and/or help line, consulting with parents about when to keep a sick child home, and providing a newsletter, in that order.

When asked to prioritize a list of common requests for advice and information, four areas received high priority status from both urban and rural providers. These include advice on special needs children, development of guidelines for sick children, development of infectious disease (ID) protocols, and phone consultation for sick children. Referrals to health care providers, OSHA compliance, health promotion, licensure compliance, and advise on safety and playground equipment were rated of medium importance overall. Review of health records and assistance in screening applicant employees were low priority needs. These and related findings are summarized in Table 4.

Table 4. Need for Nurse Consultation

Consultation	Rural	Urban	All
Advice on Special Needs	●	●	●
Develop Guidelines for Sick	●	●	●
Develop ID Protocols	●	●	●
Phone Consultation for Sick	●	●	●
Review Immunizations	●	○	○
OSHA Compliance	○	◑	◑
Referrals to Health	●	◑	◑
Health Promotion Programs	◑	◑	◑
Licensure Compliance	◑	◑	◑
Review Health Records	◑	○	○
Advice on Safety	◑	◑	◑
Advice on Playground	◑	◑	◑
Help Screen Applicants	○	○	○

● =high priority ◑ =medium priority ○ =low priority

Urban and rural respondents differed in their need for assistance with immunization review.
Rural providers rated immunization review as a high priority in their centers whereas

urban providers set it as a low priority.

The second most requested need for public health nurse services was to provide advice and information. . . to include advice on special needs children, development of guidelines for sick children, development of protocols, and phone consultation for sick children.

When asked about their method for keeping immunization records current, the most common method cited by providers overall was periodic file review followed by the use of a tickler file. The least common method cited was using a nurse consultant for review. Rural providers, however, appear to use or desire to use nurse consultants for immunization record review more regularly than urban providers. Approximately five percent of respondents said that they use a computerized immunization tracking system. Findings are displayed in Table 5.

Table 5. Method Used to Keep Immunization Records Current

Method	Rural	Urban	All
Tickler File	◑	◑	◑
Health Dept Monitor	○	◎	◎
Nurse Consultant	◎	○	○
Periodic File Review	●	●	●

●=most common method ◑=next most common method
◎=less common method ○=least common method

Advice on special needs children was recorded as a high priority for the majority of childcare provider respondents. When asked to describe the special needs of children in their care, providers generated an extensive list including twenty-three different disorders from speech and language problems to chromosomal abnormalities. The ten most frequently cited problems are listed below in order of the frequency in which they were cited. This list summarizes 317 responses.

1. Speech and language problems
2. ADD/ADHD
3. Cerebral palsy
4. Behavioral/learning disabilities
5. Developmental delay
6. Deaf/hearing impaired
7. Downs syndrome
8. Autism
9. Asthma
10. Vision impaired

Advice on special needs children was recorded as a high priority for the majority of childcare provider respondents.

Greater than one third of centers reported having one to five special needs children in their care. Nearly ten percent had six to ten special needs children. The average number of special needs children in both rural and urban centers is three. Specific results are reported in Table 6.

Table 6. Number of Special Needs Children Enrolled in Center

Special Needs Children	Rural	Urban	All
No Response	4%	9%	8%
None	36%	43%	42%
1 to 5 Children	43%	34%	36%
6 to 10 Children	13%	8%	9%
11 to 15 Children	2%	2%	2%
16 to 20 Children	0	2%	1%
21 to 53 Children	2%	2%	2%
Average Number of Special Needs Children Enrolled per Center	3	3	3

Staff Training Needs

Over the past twelve months, respondent agencies reported that two-thirds of their childcare staff had completed training in universal precautions. Two-thirds of those in urban areas also were trained on center policies and procedures. Between one-third and two-thirds of rural and urban center staff received training in communicable diseases, injury prevention, and child abuse and neglect. Less than one-third of all staff were enrolled in fever management and acute care training. Results are displayed in Table 7.

Table 7. Staff Training During Last Twelve Months

Topic	Rural	Urban	All
Universal Precautions	●	●	●
Policies and Procedures	◑	●	●
Communicable Diseases	◑	◑	◑
Injury Prevention	◑	◑	◑
Child Abuse/Neglect	◑	◑	◑
Nutrition	◑	○	○
Fever Management	○	○	○
Acute Care	○	○	○

●=more than two-thirds of staff

◑=between two-thirds and one-third of staff

○=less than one-third of staff

Inadvertently left off the list of training possibilities on the assessment tool was training for CPR/First Aid. Eighty-nine centers told us that their staff had received training in this area over the past year. Approximately three percent also noted staff training in medication administration. Medication administration training for childcare providers is now mandatory in the state of Colorado for licensed childcare providers.

Training, where conducted, was generally provided on site, followed in frequency of location by childcare conferences, local Resource and Referral agencies, and local colleges. Regarding off-site training, rural centers depended more heavily on local colleges than urban centers, perhaps a reflection of less availability of conferences to rural centers. Other sources of training for both rural and urban centers included Heart Smart, the American Red Cross, Schools, and local hospitals. Training was reported as adequate eighty to ninety percent of the time. See Table 8.

Table 8. Source of Staff Training

Source	Rural	Urban	All
On Site	1	1	1
Child Care Conferences	3	2	2
Local Resource/Referral	4	3	3
Local College	2	4	4
Other common sources of training:			
Heart Smart	School District		
American Red Cross	Hospital		

In addition to assessing current training activity, providers were asked about their current unmet needs for health and other types of training. As depicted in Figure 1., staff training was the third most frequently requested type of nurse consultant service.

Possibly related to licensure requirements, the top three health training needs reported were for first aid, CPR, and universal precautions. Most childcare staff are already certified in these areas (see Table 11.) but the continual need for renewal and orientation of new childcare staff are probable reasons for their ongoing high

training priority. Findings are displayed in Tables 9. and 10.

Table 9. Need for Health Training

Health Training	Rural	Urban	All
First Aid	●	●	●
CPR	●	●	●
Universal Precautions	●	●	●
Emergencies	●	◑	●
Special Needs Children	◑	◑	◑
Infection Control	◑	◑	◑
Medication	◑	◑	◑
Identifying Sick Children	○	◑	◑
Lice	○	○	○
Pink Eye	○	◑	◑
Chickenpox	○	○	○
Preventive Dental care	○	○	○

● =high priority ◑ =medium priority ○ =low priority

Staff training was the third most frequently requested type of nurse consultant service.

As noted in Table 10., topics of lowest priority included potty training, seatbelt use, bike helmet safety, lice, chickenpox, and preventive dental care. The low priority status of dental care is consistent with the low priority for nurse consultation in this area as previously noted.

Several training topics were rated of medium priority with a few discrepancies between rural and urban areas. Although advice on infection control, special needs children and the identification of sick children were high priorities for nurse consultation, they were of medium priority for staff training. Perhaps these are areas where childcare staff would rather defer to the expertise of a nurse than develop their own proficiency. In contrast, the need for training in medication administration appears to be greater than the need for the service to be provided directly by a nurse.

Table 10. Need for Other Health Training

Other Health Training	Rural	Urban	All
Behavior and Discipline	●	●	●
Signs of Neglect/Abuse	●	◑	●
Child Growth/Development	◑	◑	◑
Communicating with	◑	◑	◑
Injury Prevention	○	◑	◑
Playground Safety	◑	◑	◑
Food Safety	◑	◑	◑
Potty Training	○	○	○
Nutrition	◑	◑	◑
Poison Control	◑	◑	◑
Hygiene	○	◑	◑
Seatbelt Use	○	○	○
Bike Helmet Safety	○	○	○

● =high priority ◑ =medium priority ○ =low priority

Table 11. Percent of Childcare Staff Certified

Method	Rural	Urban	All
CPR Certified	73%	76%	75%
First Aid Certified	65%	75%	74%
Planning to Become Certified in Medication Administration	20%	26%	25%

Training with regard to behavior and discipline was given the highest priority of all other health related training topics. Signs of child abuse and neglect training were of high importance overall,

particularly in topics that included child growth and rural centers. Of moderate priority were development, communicating with parents, injury prevention, playground safety, food safety, nutrition, poison control, and hygiene.

Signs of child abuse and neglect training were of high importance overall, particularly among rural centers.

Although nutrition and safety were identified within the top three needs of the children in their care, providers gave medium priority to training in these areas. Perhaps providers have established other sources of nutrition and safety training.

Need for Child and Family Services

Four of seven areas listed on the assessment regarding nurse services for children and families were given high priority by provider respondents. These include:

- Parent information on when to keep a sick child home
- Parent information on when to take a sick child to the doctor
- Parenting classes
- TV watching guideline for parents

Smoking cessation classes for parents and exercise programs for families and children were given a low priority overall. However, rural providers rated parent smoking cessation classes as a high priority and exercise as medium priority.

There was a moderate interest overall in having nurses assist families in learning about the provision of nutritionally balanced meals. It was a high priority interest area for rural providers. Table 12. displays results.

Table 12. Need for Services for Children and Families

Service/Training Topic	Rural	Urban	All
When to Keep a Sick Child Home	●	●	●
When to Take a Sick Child to the Doctor	●	●	●
Parenting Classes	●	●	●
TV Watching Guidelines	●	●	●
Smoking Cessation for Parents	●	○	○
Nutritionally Balanced Meals	●	◑	◑
Exercise Program	◑	○	○

● =high priority ◑ =medium priority ○ =low priority

Current Nurse Childcare Consultant Utilization

Providers were asked how often in the past twelve months they had consulted with a nurse regarding some aspect of their services. Over three-fourths of providers who responded to this question said that they have used a nurse consultant at least once in the past twelve months. Sixteen percent (55 providers) did not respond to this question.

Nurse consultants are more often utilized in urban centers rather than rural ones. This perhaps is more a reflection of relative differences in availability rather than need.

Assuming that non-response equates with non-use, the recalculated proportion of users of nurse consultants

would be two-thirds rather than three-fourths.

Approximately two percent of respondents employ their own nurse consultant. Sometimes this nurse is a full time employee. In one center the nurse is employed as an infant caregiver. In another, the nurse is on site at least eight hours per week and available by pager at all times.

Although advice on infection control, special needs children, and the identification of sick children were high priorities for nurse consultation, they were of medium priority for staff training. Perhaps these are areas where childcare staff would rather defer to the expertise of a nurse rather than develop their own proficiency.

Nurse consultants are more often utilized in urban centers than in rural ones. This perhaps is more of a reflection of relative differences in availability as opposed to need. Nearly half (49%) of urban centers reported using a nurse consultant six or more times over the past year compared to thirty-two percent of rural centers. Forty-five percent of rural centers reported using a nurse consultant one to five times per year. Table 13. details findings.

When asked what they paid, or would pay for, a contract nurse consultant, the majority of urban respondents (59%) reported paying or anticipated paying $25 to $50 per month. Twenty-three percent said that they paid or would pay less than $25 per month, eight percent paid more than $50 per month. Rural providers reported more variation in contract nurse payment. Thirty-five percent pay, or would pay, less than $25 per month, 35 percent, $25 to $50 per month, and 25 percent, more than $50 per month.

Table 13. Use of Nurse Consultation in Past Twelve Months

Frequency	Rural	Urban	All
Never	23%	23%	23%
1 to 5 Times	45%	21%	23%
6 to 9 Times	10%	21%	20%
10 to 12 Times	16%	13%	14%
More Than 12 Times	6%	15%	14%
Other	0	7%	6%

Sixteen percent of centers chose not to answer this question.

Approximately 2 percent of respondents employ their own nurse consultant.

Some respondents gave hourly rates for contract nurse consultants rather than monthly rates. Hourly rates ranged from $25 to $40 per hour. Some said that they could not estimate a rate because it would be dependent on use. Others reported that they would like to use the services of a nurse consultant but had no budget for their services. One respondent noted that she could *barely pay her staff let alone a nurse consultant.*

Approximately two-fifths of those surveyed did not or could not answer this question because they did not know or said that they would have to ask someone else. Results are displayed in Table 14. on the next page.

Public health nurses who were interviewed for this study shared several observations and insights regarding their work with childcare providers in their area. Several nurses expressed their concern regarding provider compliance with state regulations

requiring that a nurse with a specialty in maternal and child health consult with centers that care for toddlers. These nurses observed centers where a parent who happened to be a nurse, but without maternal child health expertise, was designated as the nurse consultant. Their understanding was that the parent nurses had no formal roles or responsibilities and were not formally compensated for their consultation.

Nurses want to do more. They perceive a need greater than they are being asked to fill. "Some providers don't call unless they have to," commented one nurse.

Table 14. Current or Anticipated Monthly Pay for a Contract Nurse Consultant?

Fee Range	Rural	Urban	All
Less Than $25 per	35%	23%	26%
$25 to $50 per Month	35%	59%	54%
$51 to $60 per Month	10%	3%	5%
More Than $60 per	5%	5%	5%
Other	15%	10%	10%

Approximately two-fifths of those surveyed did not or could not answer this question because they did not know the answer or would have to ask someone else.

All nurses interviewed cited a pressing need for a nurse partnership with childcare center providers. Several perceived that there existed financial barriers to contracting for nurse consultation services. However, nurses who are associated with local health departments are able to provide low or reasonable cost childcare consultative services as a health department subsidized service. It is not uncommon for a local public health nurse to offer a package of contract services monthly which might include staff or parent education, an on-site visit if requested, newsletter, immunization review, and daily phone availability. Monthly contractual fees for these combined services range from $35 to $65 per month.

Nurses talked about the need for ongoing provider training that they observed at centers. Some centers struggle with meeting minimum training requirements for licensure. According to nurses, many childcare center staff need more education in the areas of:

- Sick child triage
- Nutrition and feeding
- Playground safety
- Child abuse and neglect
- Infection control
- Product recall and safety
- Frequent health problems
- Emergencies
- Preventive dental care
- Communication with parents
- Discipline and aggressive behavior
- Medication administration
- Child development

Most nurses prefer to deliver education on site giving them a presence at the center to develop skill building and observe application of training. Other needs identified by nurses include the development of sick child protocols and protocols for inclusion/exclusion of sick children from centers. Some nurses also felt that centers require more education regarding licensure.

Nurses are most often called upon by childcare centers to provide traditional services such as immunizations, staff physicals, TB skin tests, and the basic

staff education required for licensure, i.e. CPR/First Aid and universal precautions. Nurses want to do more. They perceive a need greater than they are being asked to fill. *Some providers don't call unless they have to*, commented one nurse.

One nurse spoke of providing free immunization record checks to all providers in her area who wanted them. This free service generated relationships with approximately 50 percent of those contacted: *Now they call for questions regarding diagnosis of pink eye and when to keep a sick child home.* Free health and safety newsletters and educational materials are other means by which nurses have engaged providers.

Nurses must be available and responsive to provider needs. Those who do not possess necessary competencies must be trained. Creative strategies for building trusting supportive learning environments for childcare staff must be employed.

Summary and Conclusions

Nurses and childcare providers concur that nurses have a role in the health and safety of children cared for in childcare centers. Beyond the traditional public health functions that nurses have provided, they can help centers by providing training, skill building, and support to childcare staff as well as assessment and referral of the children in their care. The health and safety of numerous children can be enhanced through guidance and collaboration with providers.

Due to the relatively new or enhanced arrangement this establishes between providers and nurses, strategies must be developed to engage providers in trusting and receptive relationships. Providers must clearly identify the health and safety competencies and deficiencies of childcare staff and parents. Deficiencies must be translated into requests for nurse consultation.

Nurses must be available and responsive to provider needs. Those who do not possess necessary competencies must be trained. Creative strategies for building trusting supportive learning environments for childcare staff must be employed.

The information in this study should guide the future development of nurse provider partnerships and serve as a basis for the design of programs and consultative services. It can also serve as a template for nursing curriculum design and be used to structure expectations for quality measures in centers. Above all, it provides compelling information in support of the promotion of health, safety, and well-being of children in childcare centers throughout the state.