Southern Piedmont Partnership
for Public Health

Evaluation of the Dental Practice Management Consultancy Project

November 2009
Overview

In Fiscal Year 2009, the Dental Taskforce of the Southern Piedmont Partnership for Public Health (SPPPH) contracted with a Practice Management Consultant to assess, analyze and provide tailored recommendations regarding the operational efficiency, practice production and staff satisfaction of five dental practices operating within the SPPPH. The consulting group’s process included three steps: 1) Assessment (currently underway); 2) Presentation of data (April 28th); and 3) Systems training (May 12-13th).

On behalf of the Southern Piedmont Partnership for Public Health (SPPPH), the North Carolina Institute for Public Health Evaluation Services conducted an evaluation of this Dental Practice Management Consultancy Project. The evaluator worked with Dr. Kim Dehler and Ms. Cappie Stanley on identifying the guiding evaluation questions of interest to the SPPPH Dental Taskforce. This work group reviewed the evaluation plan and provided feedback on the evaluation questions and methods (Appendix A).

The main purposes of the evaluation were to assess staff response to the practice management assessment and analysis process and to identify short term impacts of the assessment process on staff attitudes toward practice quality and efficiency. There were four questions guiding the data collection for this evaluation: 1) To what extent were dental practice managers and practice staff satisfied with the assessment and analysis process? 2) In what ways was the consultants’ process useful for dental practice managers and practice staff (e.g., team building, increasing staff awareness)? 3) What effect has the process had on staff interest in and enthusiasm for improving quality and efficiency? 4) What lessons have participating dental practices learned through the process that could help improve quality and efficiency for other clinical program or dental practices in other parts of the state?

Methods

The evaluator used two data collection methods for this evaluation: 1) Interviews – the evaluator conducted interviews lasting approximately one hour with all five of the dental program directors. For a copy of the interview guide, see Appendix B. 2) Survey – an on-line survey was administered to individuals from four of the five dental practices who attended the May 12th-13th systems training. For Stanly County, paper surveys were mailed to the practice director and completed responses were mailed back to the evaluator for data entry. Email addresses and contact information were provided by Ms. Bobbie Rowe of the Cabarrus Health Alliance. For a copy of the survey, see Appendix C.

Quantitative survey responses are presented as frequencies and proportions. In certain parts of this report, we present the percent of respondents who chose the highest ratings on scales of agreement, satisfaction, and other scales (e.g., 5 and 6). In these cases, responses are stratified by the five dental practices. Qualitative responses are coded according to themes that emerged during analysis and are quantified as appropriate.
Results

Profile of respondents

Forty-eight of 51 staff members responded to the survey for a response rate of 94.1%. Nearly 40% of respondents were dental assistants, 21% administrative/support staff, and 21% were dental hygienists (Table 1). Five dentists completed the survey.

Table 1. Respondent’s staff position (n=44).

<table>
<thead>
<tr>
<th>Respondent Category</th>
<th>Percent (n)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dentist</td>
<td>11.4% (5)</td>
</tr>
<tr>
<td>Dental hygienist</td>
<td>20.5% (9)</td>
</tr>
<tr>
<td>Dental assistant</td>
<td>38.6% (17)</td>
</tr>
<tr>
<td>Administrative/support staff</td>
<td>20.5% (9)</td>
</tr>
<tr>
<td>Translator</td>
<td>4.5% (2)</td>
</tr>
<tr>
<td>Other</td>
<td>4.5% (2)</td>
</tr>
</tbody>
</table>

Approximately one third of respondents worked at the practice for less than two years, another one third for two to five years, and the last third for more than five years (Table 2).

Table 2. Longevity of respondent’s position at the practice (n=44).

<table>
<thead>
<tr>
<th>Respondent Category</th>
<th>Percent (n)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than 6 months</td>
<td>0 (0)</td>
</tr>
<tr>
<td>6 months to 2 years</td>
<td>29.5% (13)</td>
</tr>
<tr>
<td>2 to 5 years</td>
<td>34.1% (15)</td>
</tr>
<tr>
<td>More than 5 years</td>
<td>36.4% (16)</td>
</tr>
</tbody>
</table>

Respondents reported participating in the consultancy in several ways: taking part in the systems training (96%), filling out a staff satisfaction questionnaire (87%), and interacting with the consultant during the site visit (68%) (Table 3).

Table 3. Respondent’s involvement in consultancy (n=48).

<table>
<thead>
<tr>
<th>Participated in consultancy</th>
<th>Percent (n)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Filled out a staff satisfaction questionnaire</td>
<td>87.5% (42)</td>
</tr>
<tr>
<td>Interacted with the consultant during site visit</td>
<td>66.7% (32)</td>
</tr>
<tr>
<td>Took part in systems training (May 12-13th)</td>
<td>95.8% (46)</td>
</tr>
<tr>
<td>Other (please specify)</td>
<td></td>
</tr>
<tr>
<td>E-mailed reporting information to consultant</td>
<td>4.2% (2)</td>
</tr>
<tr>
<td>Provided financial information</td>
<td></td>
</tr>
</tbody>
</table>

Two of the five practice directors who were interviewed for this evaluation did not have dental backgrounds. Three of the directors reported regularly participating in the SPPPH Dental Task Force meetings. The evaluator asked the directors about their involvement in the consultancy process and all indicated that they facilitated communication between their staff and the consultant (i.e., collected data from staff, gave updates).
**Satisfaction with consultancy processes**

Respondents were asked to rate their overall satisfaction with the experience of taking part in the practice management consultancy process. The majority of respondents were satisfied; however, 23% of respondents gave a rating of 2 or 3 indicating they were not satisfied (Table 4).

Table 4. Respondent’s satisfaction with experience of consultancy process.

| Percent (n) with each rating on a scale of 1 to 6, where 1= Not at all satisfied and 6=Very satisfied |
|---|---|---|---|---|---|---|
| 1 | 2 | 3 | 4 | 5 | 6 |
| Satisfaction (n=47) | 0 (0) | 10.6% (5) | 12.8% (6) | 25.5% (12) | 31.9% (15) | 19.1% (9) |

When ratings of five and six were combined, indicating high satisfaction, the overall high satisfaction was about 52%.

Four of five practice directors noted they were satisfied with their involvement in the consultancy. The one director who was not satisfied indicated that the length of the site visit was insufficient for the consultant to understand their practice processes. She did indicate that she was satisfied with the information generated from the consultancy.

Practice directors were asked a series of questions for each of the three Phases of the consultancy. Their responses are described below.

- **Phase I - data collection questionnaires and on-site visit.** Three directors rated the usefulness of Phase I activities a 5 or 6, indicated they were very useful. Directors indicated that the process of collecting data sensitized staff to data they were not regularly tracking. One director noted that Phase I activities gave her staff awareness of “efficiency flow, communication patterns, and patient and financial management issues.” One director rated Phase I usefulness as a 3, primarily because the consultant did not spend enough time at their practice. Another director echoed that the consultant did not spend enough time at the practice. Two directors mentioned the challenge of collecting data for the consultant, “they sent us tools that had to fit their framework, but it was difficult because public health is not a typical dental practice – we did not have software so it was harder to pull out the data that was requested.”

Directors gave different responses for what they found to be most/least useful in Phase I. The most useful aspects included: the final summary of information provided to the consultant as it “helped staff see their production and it made it [production] not such a bad word”; the site visit because it helped them think about their goals; the required communication between finance and practice staff; and staff interviews as it helped confirm issues/concerns they already suspected. Directors described the following items as least useful: the site visit; the process of data collection1; survey of leadership characteristics because the consultant did not use this information; and the visioning exercise because the agency had previously gone through a similar exercise.

Four of five practice directors described making the following changes in agency practice as a result of going through Phase I activities: increasing staff engagement in the practice, “[I] saw more spunky engagement in staff – giving input into the whole dental process”; gaining support to purchase dental software – they were able to say to management, “we’re the only...

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1 The individual who responded to this question is not completely involved in day to day activities of the dental practice.
agency that does not have clinic software”; printing receipts instead of hand writing receipts; balancing receivable accounts; and increasing inter-departmental communication when generating reports.

- Phase II - business plan analysis and recommendations, presented on April 28th. All five practice directors gave a usefulness rating of 5 or 6, indicating that Phase II was very useful. Directors indicated that it was helpful to see all of the data pulled together and that it was particularly helpful to have several agency representatives (e.g., health director, finance supervisor) hear the recommendations at the same time. One practice director said, “the finance officer attended and was exposed to seeing the importance of reporting profits”, something that the finance officer did not share with staff in the past.

- Phase III - systems training held on May 12th and 13th, attended by dental practice staff. When asked about the usefulness of the training, three directors provided a rating of 6 and two provided a rating of 4. Those that rated it highly indicated that it was a great opportunity for team building, that it provided an “unprecedented” opportunity to bring all practice staff together”, that staff learned how to “work smarter, not harder”, training activities were interactive and consultants did an excellent job of presenting the information, and hearing that other practices were planning to make changes helped agency staff realize they need to make changes (e.g., increasing the number of appointments for the dental hygienist). One director indicated that there was too much information presented in a short amount of time and that some recommendations were not explained in detail. Another director thought the first day was beneficial, but that the second day “turned off” staff as it went into details that staff were not interested in.

### Appropriateness and likelihood of implementing recommendations

Practice directors were asked the following questions regarding Phase II: were the umbrella recommendations (overall, block scheduling, designation of an office manager, revision of appointment policies, morning huddles, and monitoring of clinic “vital signs”) appropriate and how likely is your practice to carry them out?; were there any findings with which you did not agree?; and describe any findings you did not understand.

Practice directors thought the majority of recommendations were appropriate and plan to implement them. The following are their detailed responses for each recommendation:

- **Block scheduling** - All five agreed that block scheduling was appropriate. While most plan to implement it, some will implement a modified version of it. One director indicated that staff will need further training in block scheduling before implementation.

- **Designate an office manager** - Three of the five directors agreed that designation of an office manager was appropriate and planned to hire a manager. One director indicated that their practice needs approval from county government to do so and another interviewee indicated that they already had a manager. One interviewee noted that the recommendation to have their dental secretary serve as dental manager was not feasible due to human resource issues.

- **Modify appointment policies** - All five directors agreed that changes to appointment policies were appropriate and plan to enhance or revise their current policies. One agency plans to modify some of the suggestions provided (e.g., a missed appointment will be 15 minutes late not 10 minutes, they will send reminders one to two days in advance rather than two days in advance).
• Morning huddles - One agency was implementing morning huddles prior to the consultancy and the other four indicated they plan to or have already begun implementing them. One agency plans to do morning huddles, but perhaps on a weekly basis instead of daily.

• Monitoring practice “vital signs” - All five agencies agreed that monitoring of “vital signs” was appropriate and they plan to implement it. Some may not be able to implement this immediately as they have to wait for staff hires and software to do so.

Other than what was previously discussed, three practice directors described recommendations with which they did not agree. Two directors had concerns regarding the recommended production totals for their dentist. One director indicated it was too high and another indicated that the recommendation may not be correct because the production total collected during the assessment phase was not accurate (due to a staff vacancy at the time of data collection). One director indicated that overall that were too many recommendations – her agency received five and a half pages of recommendations compared to a recent report for another project that had one page of recommendations. In addition, some of the recommendations made were not applicable to the agency because they were already implementing those practices. Some of the recommendations were more “idealistic than realistic” particularly given the constraints in public health (e.g., reminder calls and post cards are challenging when you have a transient community, batched counties do monthly data downloads not daily). None of the directors described any recommendations that they did not understand.

Survey respondents were asked to rate their level of agreement about whether or not the recommendations were appropriate for their agency. Respondents indicated a high level of agreement that overall, the recommendations were appropriate (62% provided a rating of 5 or 6). Between 72% and 88% of respondents indicated a high level of agreement that each of the recommendations was appropriate.

Respondents were also asked to indicate the extent to which they agreed that their agency is likely to implement recommendations provided by the consultant. More than half of respondents agreed that their agency was likely to implement all of the recommendations. Morning huddles and block scheduling were the most likely of the recommendations to be implemented.

**Facilitators and barriers to implementing recommendations**

Survey respondents were asked to rate how much support would come from various groups (i.e., managers/supervisors, dentists, dental hygienists and assistants, administrative support staff, and translators) in the practice towards implementation of the consultants’ recommendations. Between 63% and 74% of respondents indicated a high level of support from all of the groups (Table 9). The greatest amount of support for change came from dental hygienists and assistants (74%), followed by managers/supervisors (72%), translators (71%), and administrative support staff (70%).

Table 9. Respondents’ ratings of support received from colleagues.

<table>
<thead>
<tr>
<th></th>
<th>Percent (n) with each rating on a scale of 1 to 6, where 1= Not at all support and 6= Very much support</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Managers/Supervisors</td>
<td>2.6% (1)</td>
</tr>
<tr>
<td>(n=39)</td>
<td></td>
</tr>
<tr>
<td>Dentists (n=40)</td>
<td>5.0% (2)</td>
</tr>
<tr>
<td>Dental hygienists and assistants</td>
<td>0 (0)</td>
</tr>
</tbody>
</table>
Percent (n) with each rating on a scale of 1 to 6, where 1= Not at all support and 6= Very much support

<table>
<thead>
<tr>
<th>Respondent Category</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
</tr>
</thead>
<tbody>
<tr>
<td>assistants (n=43)</td>
<td>5.0% (2)</td>
<td>2.5% (1)</td>
<td>12.5% (5)</td>
<td>10.0% (4)</td>
<td>25.0% (10)</td>
<td>45.0% (18)</td>
</tr>
<tr>
<td>Administrative support staff (n=40)</td>
<td>5.0% (2)</td>
<td>2.5% (1)</td>
<td>12.5% (5)</td>
<td>10.0% (4)</td>
<td>25.0% (10)</td>
<td>45.0% (18)</td>
</tr>
<tr>
<td>Translators (n=28)</td>
<td>7.1% (2)</td>
<td>7.1% (2)</td>
<td>10.7% (3)</td>
<td>3.6% (1)</td>
<td>25.0% (7)</td>
<td>46.4% (13)</td>
</tr>
</tbody>
</table>

Respondents were also asked to select from a list, which things they needed from management in order to better carry out recommendations. Of the forty-four individuals who responded to this question, the most frequently reported item was designated work time for QI activities (55%), followed by the support of my supervisor (52%), and technical assistance (39%). Other things needed from management included an office manager, buy-in from staff, and more operatories (Table 10). When asked to list what would most help, the most frequently reported response was the support of my supervisor (34%).

Table 10. Facilitators that will assist agencies in implementing recommendations (n=44).

<table>
<thead>
<tr>
<th>Respondent Category</th>
<th>List all Items Percent</th>
<th>Main Item Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Designated work time for Quality Improvement activities</td>
<td>54.5% (24)</td>
<td>25.0% (11)</td>
</tr>
<tr>
<td>Support of my supervisor</td>
<td>52.3% (23)</td>
<td>34.1% (15)</td>
</tr>
<tr>
<td>Technical assistance (i.e., help from other organizations or technical experts to identify and resolve specific problems)</td>
<td>38.6% (17)</td>
<td>15.9% (7)</td>
</tr>
<tr>
<td>Other (please specify)</td>
<td>29.5% (13)</td>
<td>25.0% (11)</td>
</tr>
<tr>
<td>Need a dental supervisor or office manager</td>
<td>29.5% (13)</td>
<td>25.0% (11)</td>
</tr>
<tr>
<td>Dental program</td>
<td>29.5% (13)</td>
<td>25.0% (11)</td>
</tr>
<tr>
<td>Willing staff</td>
<td>29.5% (13)</td>
<td>25.0% (11)</td>
</tr>
<tr>
<td>Make more operatories</td>
<td>29.5% (13)</td>
<td>25.0% (11)</td>
</tr>
<tr>
<td>N/A</td>
<td>29.5% (13)</td>
<td>25.0% (11)</td>
</tr>
</tbody>
</table>

Directors were asked about what would facilitate implementation of the recommendations in their health department. Agency responses varied, including: getting support from staff (e.g., finance staff, practice staff, clinical services director) (n=3); hiring staff (e.g., hygienist, supervisor, office manager) and training them on these recommendations (n=3); training staff to use software; purchasing software; and having more practice space. Regarding hiring an office manager, one director indicated that they need a manager to “keep people on task so the dentist can have direct oversight on procedures”. The samples of appointment policies and notebooks provided by the consultant were described as helpful.

Survey respondents were asked to select from a list of barriers, which presented barriers to implementing the recommendations. Of the forty-four individuals who responded to this question, the most frequently reported barrier was that there was not enough time for implementation (64%), followed by not enough interest (39%), and insufficient expertise (34%). Other barriers included lack of help/support, lack of software, and poor leadership (Table 11). When asked to list the main barrier to implementation, not enough time was the more frequently cited barrier (35%).

Table 11. Percent of respondents indicating barriers to recommendation implementation (n=44).
Evaluation of the SPPPH Dental Practice Management Consultancy Project
Summary Report

<table>
<thead>
<tr>
<th>Respondent Category</th>
<th>List all Barriers</th>
<th>Main Barrier</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Percent</td>
<td>Percent</td>
</tr>
<tr>
<td>Not enough time</td>
<td>63.6% (n=28)</td>
<td>35.0% (14)</td>
</tr>
<tr>
<td>Not enough interest</td>
<td>38.6% (n=17)</td>
<td>20.0% (8)</td>
</tr>
<tr>
<td>Insufficient expertise</td>
<td>34.1% (n=15)</td>
<td>17.5% (7)</td>
</tr>
<tr>
<td>Other (please specify)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Lack of help/support (2)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Lack of software (1)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Poor leadership (1)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Too many meetings to be productive (1)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Transition for heavier scheduling (1)</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>31.8% (n=14)</td>
<td>37.5% (15)</td>
</tr>
</tbody>
</table>

Directors reported a couple of barriers to carrying out these recommendations, including: staff resistance/willingness to make changes (n=3) (e.g., with enforcement of appointment policies, staff do not want to burden patients who are “in pain”); ability to carry out block scheduling when dentists’ time allotment for procedures vary (i.e., some dentists do a procedure in 40 minutes, others in 60 minutes so when they cover for each other, it is difficult to accurately block time); and funding for positions and space.

Benefits of participating in consultancy

Survey respondents were asked to indicate their level of agreement with a series of statements regarding benefits and opportunities of going through the consultancy. The statements included: I am more likely to notice quality improvement opportunities; I am more excited about my job; I feel that patients receive better care; I feel that we will be more efficient; and I would be more likely to ask staff of other dental practices for advice. Fifty percent or more of respondents highly agreed that they are now more likely to notice QI opportunities, that they will be more efficient, and that they would be more likely to ask for advice from other practices (Table 12).

Table 12. Respondents’ ratings of benefits from practice management project.

<table>
<thead>
<tr>
<th>Percent (n) with each rating on a scale of 1 to 6, where 1= Strongly disagree and 6=Strongly agree</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
</tr>
</thead>
<tbody>
<tr>
<td>I am more likely to notice QI opportunities (n=44)</td>
<td>9.1%</td>
<td>4.5%</td>
<td>11.4%</td>
<td>22.7%</td>
<td>31.8%</td>
<td>20.5%</td>
</tr>
<tr>
<td>I am more excited about my job (n=44)</td>
<td>11.4%</td>
<td>11.4%</td>
<td>13.6%</td>
<td>20.5%</td>
<td>27.3%</td>
<td>15.9%</td>
</tr>
<tr>
<td>I feel that patients receive better care (n=44)</td>
<td>18.2%</td>
<td>13.6%</td>
<td>13.6%</td>
<td>29.5%</td>
<td>11.4%</td>
<td></td>
</tr>
<tr>
<td>I feel that we will be more efficient (n=42)</td>
<td>11.9%</td>
<td>14.3%</td>
<td>4.8%</td>
<td>14.3%</td>
<td>33.3%</td>
<td>21.4%</td>
</tr>
<tr>
<td>I would be more likely to ask staff of other dental practices for advice (n=44)</td>
<td>11.4%</td>
<td>9.1%</td>
<td>15.9%</td>
<td>13.6%</td>
<td>27.3%</td>
<td>22.7%</td>
</tr>
</tbody>
</table>

Thirty-nine respondents wrote in what they determined to be the greatest benefit of going through the consultancy process. Four themes emerged including: seeing that other practices...
have similar challenges (28%), opening up communication with practice team members (26%), learning new methods (18%), and learning ways of being more efficient (13%).

When practice directors were asked if what they learned through the consultancy process was worth the time and effort that they and their practice staff put into it, all five emphatically said “yes”. Directors indicated that staff involvement in the consultancy process will result in staff buy-in. It also offered staff an opportunity to learn what other agencies are doing. One director who did not have all positive feedback on the process claimed it was a “good process, having fresh eyes and ideas from someone who has experience and is energetic and positive about our potential.” Another director who does not have a dental background described why it was useful for her, “I didn’t know what staff benchmarking should be – having an expert really helped – it gave me more support with the staff.” Further, she noted that if all five practices are now collecting the same data, they can “talk the same language” and help each other out.

**Immediate results of participating in consultancy**

Practice directors were asked to report any immediate results as a result of the consultancy. Directors reported their practices making several changes already to forms, procedures, staff attitudes, and staffing patterns as a result of the consultancy (Table 14). All agencies made changes in at least two of five areas. Directors indicated that most of the changes were made either after the April 28th meeting or the May 12th/13th training. One director commented, “I hope it lasts – there was a boost with staff after the training.”

Table 14. Type of changes made, as reported by practice directors.

<table>
<thead>
<tr>
<th>Type of change</th>
<th>Number of agencies making changes and type of change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Forms</td>
<td>2 (appointment cards, creating Excel forms for monitoring goals and tracking expenses)</td>
</tr>
<tr>
<td>Procedures</td>
<td>3 (block scheduling, “mining the gold”, morning huddles)</td>
</tr>
<tr>
<td>Attitudes</td>
<td>3 (staff more flexible, “pumped up”)</td>
</tr>
<tr>
<td>Staffing</td>
<td>5 (increasing number of appointments for hygienists, assistants doing more sealants, designated practice coordinator, hiring an assistant hygienist, changing supervision, using staff in different ways)</td>
</tr>
<tr>
<td>Other</td>
<td>2 (purchasing software, increased communication among staff)</td>
</tr>
</tbody>
</table>

Practice directors were also asked to report their perception regarding staff’s interest in improving clinical quality and efficiency now that they have participated in the consultancy. Four directors reported that their staff’s interest has improved and another indicated it stayed the same. One director noted that the increase in interest was a result of the consultants showing staff they “can be more productive without killing themselves.” Another director thought the consultants’ reference of trying economic times was compelling for staff, “[dental] staff are enabling the rest of the health department to not lay people off” since profits help cover other staff’s salary.

When asked to describe what their practice will do to keep efforts at improving practice efficiency and quality alive, directors shared several ideas including: holding monthly staff meetings to make staff feel “more involved and valued” (n=2); displaying production rates and progress toward goals (n=2); using software to schedule appointments that will help meet goals (e.g., easy versus hard operatories); making a commitment to hold staff accountable to production goals and providing the necessary leadership to make changes; and rolling dental QI into agency wide CQI program.
All directors thought that working with the other dental practices would help maintain these efforts. Many talked about the importance of the already existent Dental Task Force as a way to communicate progress on benchmarks and goals. One director suggested that the directors hold half day sessions to discuss progress and ideas for implementation.

**Recommendations for improving the consultancy process**

Twenty-six survey respondents responded to the question asking about any recommendations for how to improve the consultancy processes. Nine individuals (35%) indicated that the consultant should spend more time in each health department and provide more individualized recommendations, six individuals each (23%) thought the program went well and had suggestions for their own agencies, three (12%) indicated that the program should be shorter, and two had other suggestions for improvement. For a complete list of suggestions for improvement, see Appendix D.

**Lessons learned for other practices wanting to address quality improvement and efficiency**

When asked what recommendations they would give to other practices seeking advice about how to improve the quality and efficiency of their services, 37 individuals provided responses around the following themes: work as a team with respect and communication (38%), implement block scheduling (22%), focus on “mining for gold” (11%), enforce practice policies (11%), and establish an office manager or leadership position (8%).

Practice directors also provided recommendations for other practices seeking advice about how to improve quality and efficiency of services. Two directors recommended using the same consulting service to either: a) do an efficiency study, or b) review the findings from the SPPPH consultancy with other practices. Two other directors provided a general recommendation of conducting an efficiency study. Other suggestions included: collect baseline efficiency data and determine what practices need to be implemented (e.g., block scheduling, appointment policies, office manager, clinic vital signs); review your organizational chart for duplication of efforts, lines of communication, and lines of communication; review budget requirements and guidelines of your practice; pay a bonus to staff for meeting production goals; and focus on “mining the gold” (i.e., being open to providing treatment throughout the day when the opportunity presents itself).

**Final comments**

Twenty seven survey respondents provided final comments regarding their experiences with the dental practice management consultancy. Fifteen individuals (56%) expressed their appreciation of the project, and three (11%) provided suggestions for improvement such as having the consultants talk more with the dental assistants and having practices work together at the meeting rather than be separated by their positions. Other comments included: disappointment with the process (n=1), did not like hearing people complain (n=1), the meeting facility was too noisy (n=1), and that the consultants should emphasize the importance of incremental change. One individual requested that “clinics” be referred to as dental practices so patients will be proud.

Three dental program directors provided final comments regarding the consultancy, all of which were positive. One director noted that it was very beneficial and that the practice will do what they can, but recognize they won’t be able to do everything. Another director expressed appreciation of the SPPPH providing funding for this project, noted that the lessons learned from this project are applicable to other areas of the agency, and wished there was additional funding for Phase IV.
Limitations
While confidentiality was ensured, interviewees may have been concerned about being identified in the report and may not have been fully forthcoming with their responses. Only practice staff were included as evaluation participants, and their opinions do not represent those of their co-workers (e.g., finance staff).

Discussion
Evaluation findings indicate that while perceptions of the dental practice management consultancy process varied, dental practice directors indicated it was a worthwhile effort. Further, each practice reported making at least two practice changes since the consultancy process ended. Practice changes included changes made to staffing patterns, procedures, and forms. The top three priority recommendations that staff reported were: modifying appointment policies; making scheduling changes; and designating an office manager. Practice directors agreed that the Dental Task Force is an avenue for maintaining clinic efficiency efforts.

Staff from all but one of the practices reported experiencing the following benefits from participating in the process: noticing more quality improvement opportunities; practice will be more efficient; more likely to ask for advice regarding quality improvement; patients will receive better care; and they are more excited about their job. Practice directors also described benefits of the consultancy including how the process brought finance and practice staff together, resulting in better communication and improved financial reporting.

The two practices that indicated the least satisfaction with the process and least likelihood of implementing suggestions had the following qualities in common: practice directors who did not have dental backgrounds; clinics that did not have software systems available to pull consultancy required data; and reports that the consultant did not spend sufficient time at the practice clinic prior to making recommendations.

Ironically, the most frequently reported barrier to implementing the consultancy recommendations was “not enough time” for implementation, likely due to staff being overworked and the clinic being overbooked because of no-shows. However, the recommendations are designed to improve clinic efficiency, or as one participant said, “work smarter, not harder.” Staff indicated that in order to implement recommendations they need the support of their supervisor and designated work time for quality improvement activities.

Recommendations
- Continue holding Dental Task Force meetings and using them as a way to communicate successes and challenges of clinic efficiency efforts and to foster collaboration and collective problem saving among practices. Consider selecting benchmarks for all practices to track and report on during meetings.
- Consider documenting the extent to which changes have saved time for practice staff. Communicate these findings with staff at agencies where staff are reluctant to change or indicate that “lack of time” is a barrier to implementing changes.
- Ensure that finance staff are included as an integral part of the practice management strategies and that they understand the reasons for making some quality improvements.
- For clinics embarking on such a quality improvement process, ensure that consultants spend an adequate amount of time at each agency to ensure that participants feel engaged in the process.
- Ensure that staff are included in the process of identifying and making quality improvements and that they have the support of their supervisor when trying to make agreed upon improvements.
• Share successes and lessons learned with other dental clinics and the state Division of Dental Health. Opportunities for reporting successes include presentations, publications, the Incubator website, and newsletters.
Appendix A

Background
The dental taskforce of the Southern Piedmont Partnership for Public Health (SPPPH) has contracted with a Practice Management Consultant to assess, analyze and provide tailored recommendations regarding operational efficiency, practice production and staff satisfaction of five dental practices operating within the SPPPH. The consulting group’s process is comprised of three steps: 1) Assessment (currently underway); 2) Presentation of data (April 28th); and 3) Systems training (May 12-13th).

This evaluation will be conducted by Evaluation Services staff at the North Carolina Institute for Public Health and is funded by the SPPPH.

Primary Stakeholders
Dental program directors in the Southern Piedmont, dental practice staff, health directors, other dental practices in the state that may benefit from lessons learned in this collaborative, and the NC DPH Oral Health Section.

Evaluation Purposes – a) To assess staff response to the practice management assessment and analysis process currently underway in dental programs; and b) To identify short term impacts of assessment process on staff attitudes toward clinical quality and efficiency.

Evaluation Questions
1. To what extent were dental practice managers and staff satisfied with the assessment and analysis process?
2. In what ways was the consultants’ process useful for dental practice managers and staff (e.g., team building, increasing staff awareness)?
3. What effect has the process had on staff interest in and enthusiasm for improving quality and efficiency?
4. What lessons have participating dental practices learned through the process that could help improve quality and efficiency for dental and other clinical programs in other parts of the state?

Evaluation Methods
- Conduct in-depth telephone interviews with all five dental practice managers. Questions could include: describe your involvement with the practice management consultancy; indicate your level of satisfaction and the degree of usefulness of the assessment, analysis, and recommendation phases of the practice management consultancy; describe your response to the specific recommendations for your agency; describe the likelihood of your proceeding with recommendations; which recommendations will you prioritize and why; indicate your perception of staff interest and enthusiasm for making suggested recommendations and for quality improvement in general; what barriers may exist for following recommendations; what will facilitate following through on recommendations; if another dental practice wanted to make improvements, what would you recommend to them?
- Administer an on-line survey to staff at each of the five dental practices. Questions could include: What was your involvement with the processes of the practice management consultancy?, were you satisfied with your involvement? To what extent were you satisfied with the outcomes of the assessment, analysis, and recommendations phases of the consultancy?, In what ways were the phases of the consultancy useful to you? To what extent do you agree with the recommendations? How enthusiastic are you about making some of the suggested changes? Explain your response. Do you understand the recommendations and how to move forward? What additional information do you need to understand the recommendations?
Evaluation of the SPPPH Dental Practice Management Consultancy Project
Appendix A: Evaluation Plan

Process
1. Dental taskforce will review evaluation plan and provide feedback
2. Design interview guide for interviews with dental practice managers and survey to be administered to all staff. Dental task force will review these instruments and provide feedback on May 9th meeting.
3. Develop sampling strategy.
4. Pre-test and pilot instruments.
5. Conduct interviews with dental program directors and administer surveys to dental staff.
6. Analyze results and report findings.

Proposed Timeline
Develop evaluation plan April 2009
Develop interview guide and survey April – May 2009
Conduct interviews and survey May 2009
Analyze findings and report on them June 2009

Primary contacts
Molly Cannon, NCIPH
Will lead the evaluation process and serve as primary contact.
(email: mcannon@email.unc.edu; phone: 919-966-9974)

Rachel Willard, NCIPH
(email: rwillard@email.unc.edu; phone: 919-357-1668)

Kim Dehler, Cabarrus Health Alliance
(KRDehler@CabarrusHealth.org)

Cappie Stanley, Cabarrus Health Alliance
(CLStanley@CabarrusHealth.org)
Appendix B

Hello, my name is _________ and I’m calling from the North Carolina Institute for Public Health. We have been asked by the Southern Piedmont Partnership for Public Health to evaluate staff experiences with and the preliminary impacts of the dental practice management analysis conducted by Julie Weir and Associates. This evaluation includes interviewing dental practice managers such as you, as well as surveying dental practice staff.

I think that our conversation will take approximately 30-45 minutes. Is this a good time for us to talk? [If not, set up time].

Before we talk, there are a few things that I want to let you know. Our conversation is confidential. When we report our findings, we will discuss overall trends. If we provide quotations from our interviews as examples, we will make sure that all identifying information is removed. Your participation is completely voluntary, and you may stop at any time.

Do you have any questions about this interview? Are you willing to participate?

I would like to tape record this conversation so that I can be sure to accurately record your answers. I will not share this recording with anyone, and I will destroy it after the project is complete. You have the right to ask me to stop the recorder at any time. Do I have your permission to record our conversation?

Questions

1. Describe your involvement in the practice management consultancy process. Were you satisfied with your involvement?

I would like to ask you about each of the three phases of the consultancy. As a reminder:
- Phase I included data collection/questionnaires and the on-site visit
- Phase II was the business plan analysis and recommendations – presented on April 28th
- Phase III was the Systems Training on May 12th and 13th

I will ask you to rate your overall satisfaction with each of the phases, and then I will ask for more information about your experiences.

Let’s talk first about Phase I – the data collection/questionnaires and the on-site visit.

2. How would you rate with the usefulness of Phase I activities, using a scale of 1 to 6, where 1 is “not at all useful” and 6 is “completely useful”?
   a. What are some of the reasons that you gave that rating?
   b. What activities were most useful to you?
   c. What activities were least useful to you?
   d. Did you experience any changes in your agency practice as a result of taking part in the assessment (prior to the recommendations)? If so, please describe these changes.
Now I would like to ask about **Phase II** – the business plan analysis and recommendations – presented on April 28th

3. How would you rate the usefulness of the April 28th presentation (Phase II) on a scale of 1 to 6, where 1 is “not at all useful” and 6 is “completely useful”?
   a. What are some of the reasons you gave it that rating?
   b. Below is a list of the six overarching recommendations made by the consultants. For each recommendation, let’s discuss whether you think the recommendation is appropriate for your agency and the likelihood of your agency implementing the recommendation. If it’s unlikely that you will not implement a recommendation, please describe why.

<table>
<thead>
<tr>
<th>Recommendation</th>
<th>I think this recommendation is appropriate</th>
<th>My practice is likely to carry out recommendation</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Overall</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. Block scheduling</td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Designation of an office manager</td>
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<tr>
<td>4. Revision of appointment policies (e.g., no show, cancellations)</td>
<td></td>
<td></td>
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<tr>
<td>5. Morning huddles</td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. Monitoring of clinic “vital signs” (e.g., scheduling activities)</td>
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</tbody>
</table>

c. Other than what we have already discussed, are there any areas in which you did not agree with the findings of the analysis? What were those? Why did you not agree?

d. Please describe if there were any findings you did not understand.

Let’s talk about **Phase III** was the Systems Training on May 12th and 13th and the tailored recommendations provided to your practice.

4. How would you rate the usefulness of the systems training on May 12-13th on a scale of 1 to 6, where 1 is “not at all useful” and 6 is “completely useful”?
   a. Overall, what do you think of the specific recommendations for your agency? *(prompt: were they helpful, appropriate?)*
   b. Thinking of the specific recommendations for your agency, how would you rate the likelihood that you will implement these recommendations? Please rate on a scale of 1 to 6, where 1 is “not at all likely” and 6 is “very likely”? Please describe your response.
   c. Thinking both about the umbrella recommendations and the recommendations for your agency, which recommendations will you prioritize? Why will these be your priorities?
   d. Thinking across all of the recommendations (umbrella and agency specific, what will make it easier for you to carry these out in your health department?
   e. Thinking across all of the recommendations, what barriers may exist for carrying out them out?
f. Were there any findings you did not understand?

5. Overall, do you feel that what you learned through this consultancy process was worth the time that you and your practice staff put into it? What are some of the reasons that you feel that way?

6. Have you experienced any immediate results from your participation in the practice management consultancy process? If so, what are they?
   a. Change in forms?
   b. Change in procedures (e.g., scheduling)?
   c. Change in attitudes?
   d. Change in staffing patterns?
   e. Other?
   f. [If changes were made as a result in participation]: At what point in the process were changes made (e.g., immediately after taking part in assessment, later but before April 28th meeting, after April 28th meeting)?

I have just a few more questions for you.

7. Thinking about the interest of your staff in improving clinical quality and efficiency, how does their level of interest now compare to their interest before working with the practice management consultant?
   a. [If reporting greater interest now] What specific activities or aspects of the consultancy do you think contributed to the increase in interest in quality improvement?

8. How do you plan to keep efforts to improve practice efficiency and quality alive within your practice?
   a. Are there ways in which working across dental practices could help you maintain these efforts?

9. If another dental practice asked for advice in how to improve their quality and efficiency of services, what recommendations would you have for them? Probe: what advice would you give to an agency that is interested in going through a similar assessment process? Why?

10. Do you have anything that you would like to add that I have not asked about?

Those are all of the questions that I have. Before we finish today, do you have any questions for me?

Thank you for your time!
Appendix C

Evaluation Purpose
The North Carolina Institute for Public Health was asked by the Southern Piedmont Partnership for Public Health to evaluate the dental practice management consultancy project. Through this evaluation, we hope to understand the experiences of dental practice employees with the practice management consultancy project and to assess the impact that experience had on organizational culture.

It should take you approximately 5 to 10 minutes to complete this survey. While we are asking for your name, this is for tracking purposes ONLY. Your responses are confidential. All responses will be aggregated and presented by agency, NOT by individual responses.

Please complete this survey by Friday, June 5th and fax (919-966-9138) or mail it back to Molly Cannon at:
NC Institute for Public Health
UNC Gillings School of Global Public Health
University of North Carolina at Chapel Hill
Campus Box 8165
Chapel Hill, NC 27599-8165

If you have any questions, please contact Molly Cannon at 919-966-9974 or mcannon@email.unc.edu.

Thank you in advance for your participation.

Your Name: ____________________________________________

Your Agency: ___________________________________________

1. In what ways did you take part in the practice management consultancy process? (select all that apply)
   __ a) Filled out a staff satisfaction questionnaire
   __ b) Interacted with the consultant during site visit
   __ c) Took part in systems training (May 12-13th)
   __ d) Other: _______________________

2. Overall, how satisfied were you with the experience of taking part in the practice management consultancy process? Please place an x in the corresponding box.

<table>
<thead>
<tr>
<th>Experience with taking part with the practice</th>
<th>Not at all Satisfied</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>Extremely Satisfied</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
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</tbody>
</table>

North Carolina Institute for Public Health  Page 18 of 24
3. Please rate the usefulness of each of the following activities in helping you think about the efficiency and quality of care of your dental practice. If you did not take part in this activity, choose “N/A” for “not applicable”. Please place an x in the corresponding box.

<table>
<thead>
<tr>
<th>Activity</th>
<th>Not at all Useful</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>Extremely Useful</th>
<th>n/a</th>
</tr>
</thead>
<tbody>
<tr>
<td>Filling out staff satisfaction questionnaire in December 2008</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Taking part in the consultant’s site visit</td>
<td></td>
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<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Training workshop (May 12(^{th}) - 13(^{th}))</td>
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<td></td>
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<td></td>
</tr>
</tbody>
</table>

4. In the table below, please indicate the extent to which you agree with the two statements about each of the consultant’s recommendations. If you are not familiar with the recommendations, choose “N/A” for “not applicable.” Please place your rating in the corresponding column.

<table>
<thead>
<tr>
<th>Consultant’s Recommendations</th>
<th>I think this recommendation is appropriate Rate on a scale of 1 to 6, where 1 = Strongly Disagree and 6 = Strongly Agree.</th>
<th>My practice is likely to carry out recommendation Rate on a scale of 1 to 6, where 1 = Strongly Disagree and 6 = Strongly Agree.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overall Recommendations</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Block scheduling</td>
<td></td>
<td></td>
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<tr>
<td>Designation of an office manager</td>
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<tr>
<td>Revision of appointment policies (e.g., no show, cancellations)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Morning huddles</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Monitoring of clinic “vital signs” (e.g., scheduling efficiency activities)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

5. Thinking of all the consultant’s recommendations (the umbrella recommendations for all agencies and the recommendations for your specific agency), which two recommendations do you believe should be your agency’s highest priority?

1) ___________________________________________________________________
2) ____________________________________________________________________

6. Why do you consider these to be the most important recommendations?

7. How much does each of these groups in your practice support implementation of the consultant’s recommendations? If one of these groups is not applicable to you, choose “N/A” for “not applicable”. Please put an x in the corresponding box.

<table>
<thead>
<tr>
<th>Practice Groups</th>
<th>Does not support at all</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>Very much support</th>
<th>n/a</th>
</tr>
</thead>
<tbody>
<tr>
<td>Managers/Supervisors</td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dentists</td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dental hygienists and assistants</td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Administrative support staff</td>
<td></td>
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<td></td>
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<td></td>
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<td></td>
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<tr>
<td>Translators</td>
<td></td>
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</tbody>
</table>

8. Which of the following do you believe are barriers to implementing recommendations? (select all that apply)
   __ a) Not enough time
   __ b) Insufficient expertise
   __ c) Not enough interest
   __ d) Other: ____________________________________________

9. Which of the following do you believe is the MOST IMPORTANT barrier that would prevent your practice from implementing recommendations? (select only one)
   __ a) Not enough time
   __ b) Insufficient expertise
   __ c) Not enough interest
   __ d) Other: ____________________________________________
10. What do you feel that you need from management in order to better carry out the recommendations? (select all that apply)

__ a) Support of my supervisor

__ b) Technical assistance (i.e., help from other organizations or technical experts to identify and resolve specific problems)

__ c) Designated work time for Quality Improvement activities

__ d) Other: ______________________________________

11. Which of the following do you believe is the MOST IMPORTANT thing that management could provide to help you better carry out the recommendations? (select only one)

__ a) Support of my supervisor

__ b) Technical assistance (i.e., help from other organizations or technical experts to identify and resolve specific problems)

__ c) Designated work time for Quality Improvement activities

__ d) Other: ______________________________________

12. To what extent do you agree or disagree with the following statements about the potential benefits of this process? Please place an x in the corresponding box.

<table>
<thead>
<tr>
<th>Statement</th>
<th>Strongly Disagree</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>Strongly Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>I would be more likely to ask staff of other dental practices for advice than I was before</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>6</td>
</tr>
<tr>
<td>I am more excited about my job than I was before</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I feel that we will be more efficient than we were before</td>
<td></td>
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<td></td>
</tr>
<tr>
<td>I am more likely to notice opportunities for quality improvement than I was before this experience</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I feel that patients receive better care than they did before</td>
<td></td>
<td></td>
<td></td>
<td></td>
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</tr>
</tbody>
</table>

13. If another practice asked you for advice about how to improve the quality and efficiency of their services, what recommendations would you have for them?

14. What was the greatest benefit of going through this process?
15. How would you recommend that this process be improved?

Please answer 3 questions about yourself.

16. What is your position in the dental practice?
   __ a) Dentist
   __ b) Dental hygienist
   __ c) Dental assistant
   __ d) Administrative/support staff
   __ e) Other: ______________________________

17. How long have you worked at the practice?
   __ a) Less than 6 months
   __ b) 6 months – 2 years
   __ c) 2 – 5 years
   __ d) More than 5 years

18. Do you have any final comments? If so, please use the space below to share them.

Thank you for your time!
Spend more time at the practice during assessment

- Talk to every department when visiting the practice.
- They need to stay the entire day when observing the practice and get there in the morning.
- Have more time in dental office for observation, by the consultant.
- It would have been better if there was more of an interaction in a one on one setting with each HD/Practice to address that dept's problems.
- More individualized time with each county and the practice consultant to review recommendations specific to that county.
- I think that the health departments might have benefited from more time devoted to individual departments and what could be improved on in their specific settings.
- Address the specific and real issues of each individual practice.
- Specifically at our practice I believe we are trying too many changes at once. For example, we are trying to double our patient load daily (30 minute prophies), however our Drs. don't have anymore time to check them. Why not add 1-2 more, become efficient with those before adding more patients? Baby steps before the marathon.
- Knowing more about individual offices before making recommendations.

Shorten the Program

- Shortening the program
- Try to shorten if possible
- Sometimes there seemed to be wasted time.

Other Suggestions

- More hands on activities, instead of us just listening.
- I feel that the consultants did not realize the hardships of our patients.

Positive Comments

- Have them more often.
- I thought it was absolutely great. Great energy from the speakers. Other offices were really open to us. I really liked the activities (fun stuff) - food was great too.
- I had a lot of fun interacting with others and our team, keep that up. That keeps people involved and more interested in what is going on.
- Everything went great.
I think that they way the process was presented was done very well.

Nothing to improve the workshop was great and the ideas were fantastic

### Ideas for Agencies

- **EVERYONE DO THE SAME THING**

- Seeing a high number of hygiene patients will not allow for relationships to be built. Parents and patients appreciate one-on-one time with question/answer time. Too many patients will feel like an assembly line. If I were a patient here, I would not want that type of treatment.

- Opening minds! And listening to YOUR employees and not talking down to them when someone has an idea and or (and most importantly) a CONCERN.

- Employers continue to include their entire staff in decision making processes and make them feel needed.

- Everyone on the same page: managers & staff

- I feel that each person should NOT be assigned a certain job. I think it should rotate so that one person isn't doing the same each week. (assistants)