Circumcision: We Have Heard From the Experts; Now Let's Hear From the Parents

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ABSTRACT. Objective. The current study sought to investigate parental attitudes about circumcision and their satisfaction with the decision.

Methodology. Parents of boys (6 months to 36 months old) in 3 different practices filled out a questionnaire while waiting for their child’s well-child examination.

Results. A total of 149 families were surveyed. Families (68) who did not have their sons circumcised were less satisfied with their decision. Compared with families (81) of circumcised children, parents of uncircumcised boys were less likely to have been asked by their physician about whether they wanted their child circumcised, believed that they did not receive adequate information about the procedure, felt less respected by their medical provider, and were more likely to reconsider their decision.

Conclusion. The importance of adequate information and discussion is highlighted by this study. Pediatrics 2001;107(2). URL: http://www.pediatrics.org/cgi/content/full/107/2/e20; circumcision, doctor-patient communication, parental satisfaction.

ABBREVIATIONS. AAP, American Academy of Pediatrics; CHLA, Childrens Hospital Los Angeles.

Recently, the American Academy of Pediatrics (AAP) updated their policy on circumcision.1 The policy represents a well thought out, reasoned approach to the highly charged issue of circumcision. The policy stresses the importance of accurate and impartial information provided to the family for discussion with their physician. Routine circumcision is not recommended but the authors cite new medical evidence in support of circumcision. This new information, notably studies relating a higher incidence of urinary infection in the uncircumcised,2 led to a reassessment of the policy. This differs from the AAP policy in 1971,3 which indicated that circumcision is not medically indicated.

Wiswell et al4 reported an increase in postneonatal circumcision from 1985 to 1993. No data were presented as to why this was occurring. At our institution in the primary care practice, it was also noted that an increasing number of parents were requesting late circumcision. Discussions with the families suggested dissatisfaction with the original decision regarding circumcision. This study was undertaken to document the degree of satisfaction that parents have with their initial decision, and how they perceive physician involvement in the decision process.

METHODS

Participants

Parents of male children under 3 years of age were recruited from 3 clinical practices in the Los Angeles area (La Canada, Inglewood, and Childrens Hospital Los Angeles [CHLA]), while they are waiting for their children’s routine appointments. The survey was conducted from February to April 1999. The practice sites were picked because of the diverse population served by the physicians. The practice in La Canada is in a suburban high-income community; the practice in Inglewood is an inner-city practice serving the black community, and the primary care practice at CHLA serves a low income, ethnically mixed, but predominantly Hispanic population.

Instrument

The Parental Attitudes on Circumcision Questionnaire, a questionnaire designed by the authors of this study, consisted of a 25-item scale (see “Appendix”). Items consisted of demographic information, circumcision status of child, reasons that influenced decision, information received about circumcision, and satisfaction level with decision made, as well as care provided by the medical community. Questions were presented in a multiple-choice format and fill-in the blank. The parent could choose to fill out the Parental Attitudes on Circumcision Questionnaire in Spanish, which had been translated by the research staff at CHLA. Consent was obtained and the institutional human protection committee approved the questionnaire.

Statistical Analyses

Descriptive statistics were used for the majority of the questionnaire. Nonparametric tests (2-way contingency table analysis using cross-tabs) were used for the forced choice items. These included circumcision status versus whether they reconsidered their decision, whether doctor’s respected their decision, and whether they received enough information, and site of pediatric practice. Kruskal-Wallis tests were used to analyze the relationship between the level of satisfaction with the parent’s decision to circumcise or not circumcise their child and circumcision status, as well as level of satisfaction with their decision and site of pediatric practice.

RESULTS

A total of 149 surveys were completed and returned by the participants; 46.3% (n = 69) were from a private pediatric practice in La Canada, California; 30.2% (n = 45) were from the primary care clinic at CHLA; and 23.5% (n = 35) were from a private pediatric practice in Inglewood, California. The majority of the participants (132/88.6%) were patients’
mothers, 13 fathers (8.7%); 2 other relatives (1.3%); and 2 were foster parents (1.3%). The sample represented a variety of ethnic backgrounds comprising of 34.9% white (n = 52), 28.9% black (n = 43), 23.5% Latino (n = 35), 4% Asian American (n = 4), .7% Native American (n = 1), and 8.1% other (n = 12).

The sample was diverse in terms of socioeconomic status: 24.2% with incomes below $15,000 and $29,999 (n = 31), 6.7% with incomes between $30,000 and $49,999 (n = 10), 12.8% with incomes between $50,000 and $69,999 (n = 19), 10.7% with incomes between $70,000 and $89,999 (n = 16), and 22.8% with incomes above $90,000. Two percent of the sample (n = 3) did not answer the income question.

The sample also varied in terms of education level (Table 1). Of the mothers, 7.4% completed grades 0 through 11, 18.1% graduated high school, 21.5% attended some college, while 33.6% graduated from college and 10.1% obtained a graduate degree. The remaining 8.7% went to a technical/trade school.

A 2-way contingency table analysis was conducted to evaluate whether the practice site was related to family income. The 2 variables were site of practice (CHLA, Inglewood, and La Canada) and annual family income level (below $15,000; between $15,000 and $29,999; between $30,000 and $49,999; between $50,000 and $69,999; between $70,000 and $89,999; and above $90,000). Site of pediatric practice and annual family income level were found to be significantly related (Pearson$^2$ [10; n = 146] = 118.377; P < .001 Cramer’s V = .64). The participants at the La Canada site reported a significantly higher annual family income than did participants at the CHLA or Inglewood sites.

To evaluate whether circumcision status was significantly related to practice site, a 2-way contingency table analysis was performed. The 2 variables were circumcision status (circumcised and not circumcised) and site of pediatric practice (CHLA, Inglewood, and La Canada). Circumcision status and site of pediatric practice were found to be significantly related (Pearson$^2$ [2; n = 149] = 49.98; P < .001 Cramer’s V = .58). The proportion of parents who had their child circumcised at CHLA, Inglewood, and La Canada, respectively, were 16%, 49%, and 83%. Follow-up pairwise comparisons were conducted to evaluate the difference among these proportions. The Holm’s sequential Bonferroni method was used to control for type I error at the .05 level across all 3 comparisons. All 3 comparisons were significant, with La Canada having the largest proportion of circumcised males, followed by Inglewood, and then CHLA.

A Kruskal-Wallis test was conducted to evaluate differences among the 3 pediatric practice sites (La Canada, Inglewood, and CHLA) on median satisfaction level with the decision to circumcise or not circumcise their child. The test results were significant ([2; n = 148] = 17.73; P = .001). The proportion of variability in the ranked dependent variable accounted for by the site of the pediatric practice was .12, indicating a fairly strong relationship between site of pediatric practice and the satisfaction level with the decision to circumcise or not circumcise the child. Follow-up tests were conducted using the Mann-Whitney U procedure to evaluate pair differences among the 3 groups. Type I error was controlled for across the tests using the Holm’s sequential Bonferroni approach. The results of these tests indicated a significant difference between the CHLA site and the La Canada site (z = −3.98; P < .001) and a significant difference between the Inglewood site and the La Canada site (z = −3.03; P = .002). In both cases, the participants at the La Canada site were more satisfied with their decision to circumcise or not circumcise the child than those at the Inglewood or CHLA sites.

Ethnic differences between the practices were consistent with the study design reflecting a predominantly Hispanic population at CHLA (62%), black population in Inglewood (86%), and white (71%) in La Canada (Table 1). For analysis purposes, the practice site can serve as a proxy for ethnic difference.

Some parents/custodial relatives chose not to participate in the study (<10 families in all 3 sites). Some of the reasons were: not having enough time to fill out the questionnaire, needing to attend to their child (or children) in the waiting room/examination room, not being the biological parent (foster parent or relative), or not being interested in participating. Five of the 149 returned questionnaires were in Spanish.

Of the 149 boys, 68 were not circumcised (45.6%) and 81 were circumcised (54.4%). The majority of the circumcisions 75 (93%) were completed before the child was 8 weeks old. The decision whether to circumcise the child was most often made by both parents (n = 79 [53.0%]); followed by the mother (n = 46 [30.9%]); the father (n = 15 [10.1%]); other family member (n = 3 [2.0%]); and/or a health care provider (n = 5 [3.4%]). One survey did not contain data on who made the decision to circumcise or not circumcise the child. The majority of parents (n = 124 [83.2%]) agreed on the decision to circumcise or not circumcise the child; 14 (9.4%) did not agree; 10 (6.7%) participants did not have the other parent

<table>
<thead>
<tr>
<th>TABLE 1. Practice Site</th>
<th>CHLA</th>
<th>Inglewood</th>
<th>La Canada</th>
</tr>
</thead>
<tbody>
<tr>
<td>% circumcised</td>
<td>15.6</td>
<td>48.6</td>
<td>82.6</td>
</tr>
<tr>
<td>Ethnicity</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>White</td>
<td>6.7</td>
<td>.0</td>
<td>71.0</td>
</tr>
<tr>
<td>Hispanic</td>
<td>62.2</td>
<td>5.7</td>
<td>7.2</td>
</tr>
<tr>
<td>Black</td>
<td>26.7</td>
<td>85.7</td>
<td>1.4</td>
</tr>
<tr>
<td>Asian-American</td>
<td>0.0</td>
<td>2.9</td>
<td>7.2</td>
</tr>
<tr>
<td>Other</td>
<td>4.4</td>
<td>5.8</td>
<td>13.0</td>
</tr>
<tr>
<td>Education</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mother</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than high school</td>
<td>20.0</td>
<td>5.9</td>
<td>.0</td>
</tr>
<tr>
<td>High school graduate</td>
<td>31.1</td>
<td>32.4</td>
<td>2.9</td>
</tr>
<tr>
<td>Some college</td>
<td>22.2</td>
<td>35.5</td>
<td>14.5</td>
</tr>
<tr>
<td>College graduate</td>
<td>8.9</td>
<td>8.8</td>
<td>62.5</td>
</tr>
<tr>
<td>Trade school</td>
<td>13.3</td>
<td>14.7</td>
<td>2.9</td>
</tr>
<tr>
<td>Graduate school</td>
<td>4.4</td>
<td>2.9</td>
<td>17.4</td>
</tr>
<tr>
<td>Family income</td>
<td></td>
<td></td>
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<tr>
<td>$0–$14 000</td>
<td>46.7</td>
<td>46.9</td>
<td>.0</td>
</tr>
<tr>
<td>$15 000–$49 000</td>
<td>48.8</td>
<td>40.7</td>
<td>8.7</td>
</tr>
<tr>
<td>$50 000–$89 000</td>
<td>4.4</td>
<td>12.6</td>
<td>42.0</td>
</tr>
<tr>
<td>&gt;$90 000</td>
<td>.0</td>
<td>.0</td>
<td>49.3</td>
</tr>
</tbody>
</table>
involved in the decision; and 1 survey was missing data on this question.

The reasons the child was or was not circumcised are presented in Table 2 (the participant could check as many possibilities as they felt relevant). The most prevalent reason cited was mother’s choice. The parent was asked to rank which of the items they chose were most important in their decision. The most important reason to circumcise or not circumcise the child was health reasons (n = 35 [23.5%]). The other reasons, in order of importance, were: not necessary (n = 26 [17.4%]); father’s choice (n = 25 [16.8%]); mother’s choice (n = 19 [12.8%]); so the child looks like his father (n = 12 [8.1%]); too painful (n = 8 [5.4%]); religious practice (n = 5 [3.4%]); so the child looks like his peers (n = 5 [3.4%]); other reason written in by participant (n = 5 [3.4%]); advice of doctor (n = 4 [2.7%]); so the child looks like his brothers (n = 2 [1.3%]); the child was born premature (n = 2 [1.3%]); and circumcision too dangerous (n = 1 [0.7%]).

On a 1 to 10 (most) scale, the participants were asked to rank their satisfaction with their circumcision decision. The mean level of satisfaction with the decision to circumcise or not circumcise their child was 7.56 (standard deviation: 2.56; range: 1–10). When asked whether they would make the same decision about circumcising or not circumcising their child, 122 participants (81.9%) responded that they would make the same decision, 23 (15.4%) responded that they would not make the same decision, 1 (.7%) said that they didn’t know, and 3 participants did not answer this question. When asked whether they ever reconsidered the decision to circumcise or not circumcise the child, 119 said no (79.9%), 29 said yes (19.5%) they had reconsidered the decision, and 1 survey was missing data on this question. Of those 29 who had reconsidered the decision, 16 (55.2%) reconsidered when the child was between 0 and 2 months old; 8 participants (27.6%) reconsidered the decision when the child was between 3 and 6 months old; 3 (20.0%) reconsidered the decision when the child was between 7 and 12 months old; 1 (0.7%) reconsidered the decision when the child was between 13 and 18 months old; and 1 (0.7%) reconsidered the decision when the child was between 25 and 30 months old.

Participants were most frequently asked about their decision to circumcise or not circumcise the child before the infant was born (n = 53 [35.8%]). The other times the participants were asked about their decision to circumcise or not circumcise the child included: while in the hospital (n = 33 [22.3%]); in the delivery room (n = 21 [14.2%]); and during the infant’s routine checkup (n = 4 [2.7%]).

The sources that provided participants with information about circumcision are presented in Table 3 (more than one answer possible). The medical provider who asked the participant about the decision to circumcise or not circumcise the child is presented in Fig 1 (more than one answer possible). Obstetricians were the most frequent medical providers who asked about the participant’s decision. However, 43 participants (28.9%) reported that they were not asked by any medical provider about their decision to circumcise or not circumcise the child.

Ninety-four participants (63.1%) reported that they were provided with enough information about circumcision, whereas 55 (36.9%) reported that they were not provided with adequate information. A 2-way contingency table analysis (circumcision, yes/no; sufficient information, yes/no) was conducted to evaluate whether parents who did not have their son circumcised and who believed that they were provided with enough information were significantly related (Pearson χ² = 149 = 11.38; P = .001; Cramer’s χ² = .28). The proportion of parents whose son’s were circumcised and who believed that they were provided with enough information was 75%. The proportion of parents whose son’s were not circumcised and who believed that they were provided with enough information was 49%.

When asked whether their medical provider respected their decision to circumcise or not circumcise the child, 129 (86.6%) said yes they felt respected, 17 (11.4%) reported they did not feel respected, and 3 participants (2.0%) did not answer the question. A 2-way contingency table analysis was conducted to evaluate whether parents who did not have their child circumcised felt less respected by their medical provider than those who did have their child circumcised. The 2 variables were circumcision status (yes/no) and whether the parents felt their decision to circumcise their son was respected by their medical provider (respect decision and not respect decision).

### TABLE 2. Reasons Given For Decision

<table>
<thead>
<tr>
<th>Reason</th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mother’s choice</td>
<td>89</td>
<td>59.7</td>
</tr>
<tr>
<td>Father’s choice</td>
<td>74</td>
<td>49.7</td>
</tr>
<tr>
<td>Health reasons</td>
<td>59</td>
<td>39.6</td>
</tr>
<tr>
<td>Looks like father</td>
<td>34</td>
<td>22.8</td>
</tr>
<tr>
<td>Not necessary</td>
<td>30</td>
<td>20.1</td>
</tr>
<tr>
<td>Doctor’s advice</td>
<td>21</td>
<td>14.1</td>
</tr>
<tr>
<td>Religious practice</td>
<td>18</td>
<td>12.1</td>
</tr>
<tr>
<td>Circumcision painful</td>
<td>18</td>
<td>12.1</td>
</tr>
<tr>
<td>Looks like peers</td>
<td>11</td>
<td>7.4</td>
</tr>
<tr>
<td>Looks like brother(s)</td>
<td>10</td>
<td>6.7</td>
</tr>
<tr>
<td>Other</td>
<td>8</td>
<td>5.4</td>
</tr>
<tr>
<td>Affect sexual function</td>
<td>7</td>
<td>4.7</td>
</tr>
<tr>
<td>Circumcision dangerous</td>
<td>3</td>
<td>2.0</td>
</tr>
<tr>
<td>Born premature</td>
<td>2</td>
<td>1.3</td>
</tr>
<tr>
<td>Child adopted</td>
<td>1</td>
<td>0.7</td>
</tr>
</tbody>
</table>

### TABLE 3. Where the Participants Learned Information About Circumcision

<table>
<thead>
<tr>
<th>Source</th>
<th>Frequency</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Obstetrics/gynecology</td>
<td>52</td>
<td>34.9</td>
</tr>
<tr>
<td>Pediatrician</td>
<td>50</td>
<td>33.6</td>
</tr>
<tr>
<td>Mother’s side of the family</td>
<td>35</td>
<td>23.5</td>
</tr>
<tr>
<td>TV/radio/newspaper/magazine/books</td>
<td>22</td>
<td>14.8</td>
</tr>
<tr>
<td>Childbirth class</td>
<td>21</td>
<td>14.1</td>
</tr>
<tr>
<td>Father’s side of the family</td>
<td>20</td>
<td>13.4</td>
</tr>
<tr>
<td>Friends</td>
<td>20</td>
<td>13.4</td>
</tr>
<tr>
<td>Other medical provider</td>
<td>8</td>
<td>5.4</td>
</tr>
<tr>
<td>Nurse</td>
<td>6</td>
<td>4.0</td>
</tr>
<tr>
<td>Midwife</td>
<td>3</td>
<td>2.0</td>
</tr>
<tr>
<td>Computer/Internet</td>
<td>3</td>
<td>2.0</td>
</tr>
</tbody>
</table>
Circumcision status and respect from the medical provider were found to be significantly related (Pearson\(^2\) [1; \(n = 146\)] = 11.15; \(P = .001\); Cramer’s \(V = .28\)). The proportion of parents whose son’s were not circumcised and felt the medical provider disrespected their decision was 22%. The proportion of parents whose son’s were circumcised and felt the medical provider disrespected their decision was 4%.

A Kruskal-Wallis test was conducted to evaluate differences among circumcision status and median satisfaction level with the parents’ decision to circumcise or not circumcise their child. The test, which was corrected for tied ranks, was significant (\(F[1; N = 148] = 15.03; P = .001\)). Parents whose children were circumcised reported a significantly higher level of satisfaction with their decision than parents whose children were not circumcised.

A 2-way contingency table analysis was conducted to evaluate whether parents who did not have their child circumcised were more likely to ever reconsider their decision. The 2 variables were circumcision status (yes or no) and whether the parents had ever reconsidered their decision. Circumcision status and reconsidering the decision were found to be significantly related (Pearson\(^2\) [1; \(n = 148\)] = 4.11; \(P = .04\); Cramer’s \(V = .17\)). The proportion of parents who did not have their child circumcised and later reconsidered their decision was 27%. The proportion of parents who did have their child circumcised and later reconsidered their decision was 14%.

A 2-way contingency table analysis was conducted to evaluate whether parents who did not have their child circumcised were less likely to be asked by a medical provider about circumcision. The 2 variables were circumcision status (yes or no) and if no one asked them about circumcision (no one or a medical provider). Circumcision status and no medical provider asking about circumcision were found to be significantly related (Pearson\(^2\) [1; \(n = 149\)] = 17.05; \(P < .001\); Cramer’s \(V = .34\)). The proportion of parents whose son’s were not circumcised and reported that no medical provider asked them about circumcision was 46%. The proportion of parents whose sons were circumcised and reported that no medical provider asked them about circumcision was 15%.

DISCUSSION

We sought to determine the factors that contribute to parental decision-making about circumcision and level of satisfaction with their decision. In this sample, the majority of boys were circumcised (54.4%). The National Health and Social Life Survey, a nationally representative probability sample of 1511 men, documented that 77% of the 1284 US-born men surveyed were circumcised, contrasted with 42% of the 115 non-US-born men.\(^5\) Whites are more likely than blacks or Hispanics to be circumcised. It was found that the level of education attained by the respondent’s mother plays a role in the circumcision rates. Respondents whose mothers did not complete high school were circumcised at a rate of 62%, whereas the rate varied from 84% to 87% for respondents whose mothers were high school graduates, attended some college, or were college graduates.

Families who had their child circumcised reported higher levels of satisfaction with their decision than did parents who did not have their child circumcised. The data are consistent in showing satisfaction at different practice sites correlating with the rate of circumcision. Parents of uncircumcised boys were less satisfied with their decision and were less likely to have been asked about circumcision, believed they did not receive adequate information about circumcision, and felt less respected by their medical provider about their decision not to circumcise their son. Additionally, parents whose children were not circumcised were more likely to reconsider their decision. Cognitive dissonance theory would predict that parents who have acted on a decision to circumcise and have limited options to reverse their decision would report less doubt and more satisfaction than parents who believe that they still have an option to circumcise.\(^6\)

One of the barriers to implementing circumcision decisions is financial. The 1999 AAP guidelines stated that circumcision should not be routinely recommended.\(^1\) This has made some insurance carriers and health plans less likely to support the need for circumcision or reimburse the procedure. Some participants in the current study who did not have their sons circumcised reported that although they wanted the procedure performed, they were told their insurance benefits did not cover it. These participants stated that they could not afford the additional expense of having the circumcision. The practice (La Canada) with the highest socioeconomic status (presumably the least economic barrier) had the highest circumcision rate. Although supportive of the effect of economic barriers on circumcision, the practice also had the highest percentage of well-educated white parents, characteristics previously identified with higher circumcision rates.\(^5\) The covariance of ethnic distribution, income, and education by geographic site made independent analyses statistically meaningless.

The current study, while providing further information about parents’ attitudes and satisfaction with their decision to circumcise or not circumcise their child, has some limitations. First, the study was ret-
rospective in nature, in that parents were asked to comment on a decision made well before completing the survey. This may have lead to inaccurate information being provided. Second, some of the participants were foster parents or other relatives who may not have had sufficient knowledge about the factors involved in the decision. Finally, some of the participants may have misinterpreted some of the questions. It was noticed that some of the participants, when asked for the most important reason for circumcising or not circumcising their child, checked more than one reason. Also, language barrier between the parents and medical providers was not specifically explored. The practice with the lowest rate of circumcision had the largest percent of Hispanic patients, although only 5 Spanish language questionnaires were filled out, suggesting that the rest were more comfortable with English.

Overall, it seems that obstetricians are the ones that are providing the most information about circumcision, with pediatricians being a close second. The third and fourth most common sources of information are the mother’s side of the family and the media (TV/radio/newspapers/books). Although obstetricians and pediatricians were cited as the most likely source of information, at least one third of the present sample stated that they did not get information about circumcision from these sources. Decisions regarding circumcision are made early. The obstetrician and family practitioner’s role in education and informing are critical, especially for the primiparous mother. Almost 40% of the participants believed that they had not been provided with enough information. For the uncircumcised child, 46% of the parents reported no medical provider discussed circumcision (as opposed to 15% of parents of circumcised child). In those situations, the physician de facto made the decision for the family without informed consent. These statistics are alarming. It indicates an increased need for medical providers to provide adequate and thorough information about circumcision. It is important that they also inquire about the parents’ attitudes and their final decision regarding the circumcision of their child. In the period after the birth, our survey documented 82.8% of parents reconsidered their decision in the first 6 months (55.2% in the first 2 months), suggesting physicians need to be sensitive to the issue and prepared for questions during these well-child visits.

The study documented that 15.4% of all the participants were unhappy about their decision, 27% uncircumcised, 14% circumcised. Only a small number of parents follow-up on their dissatisfaction to obtain a subsequent postneonatal circumcision, the financial barrier ($3000–$4000/procedure, CHLA data), the surgical risks, and pain to the child are often cited for not pursuing the procedure. Another source of dissatisfaction may be the care of the uncircumcised child. In a 1981 study of hygienic care of uncircumcised infants,7 the authors surveyed 15 mothers of uncircumcised children by telephone. Seven reported the physician freeing adhesion or retracting the foreskin during a visit in the first 6 months. Of the 15 mothers, 6 would choose to have their next male infant circumcised. Our survey did not specifically ask questions related to hygiene. No mother volunteered this to the research staff in the narrative portion of the questionnaire. None of the practice sites retract the foreskin as part of the well-child examination. Parents who were dissatisfied with their decision to circumcise and reconsidered their decision (14%), rarely followed through on reconstructive surgery. At CHLA in the past 15 years, there have been no reversal procedures done (Head of the Division of Pediatric Urology, [B. E. Hardy, oral communication, September 1999]).

This survey demonstrated that satisfaction was highly correlated with discussion and information from the medical profession. The diversity of the practice sites allows generalizability to similar practices in suburban/urban centers and demonstrates the importance of communication regardless of practice characteristics. The link between communication and satisfaction in pediatrics has been documented in past studies.8 A recent publication in Journal of the American Medical Association and in the accompanying editorial9,10 documented that in an adult setting only 9.0% of clinical decisions met the author’s definition of informed decision-making. More accurate communication and timely information would presumably lead to better informed and satisfying parental decision-making and possibly reverse the increasing number of children undergoing postneonatal circumcision.4 This study does not support or condone the circumcision decision, only the necessity to deliver accurate and informative data to parents and discuss and support the parental decision-making process.

APPENDIX

Circumcision Questionnaire (Nondemographic Questions)

Is your child circumcised?
No
Yes

Who made the final decision to circumcise or not circumcise your child?
Mother
Father
Other family member
Health care provider

Did both parents agree on the decision to circumcise or not circumcise the child?
Yes
No

Other parent not involved in decision

Age of child at the time of circumcision:
Less than 8 weeks
More than 8 weeks
Don’t know

How many brothers does your child have?

How many are circumcised?

So child looks like his brothers
So child looks like father
So child looks like other kids
Health reasons
Religious practice
Mother’s choice
Father’s choice
Advice of doctor

From the following list please check/circle the reasons you did or did not have the child circumcised (check/circle all that apply)

http://www.pediatrics.org/cgi/content/full/107/2/e20
Believe circumcision is too painful
Sexual Function (pleasure)
Born premature
Not necessary
Child adopted
Other reason you did or did not have the child circumcised, (if not listed above):

From the items you checked please identify which was the most important item which influenced your decision (check or circle only one)
- Religious practice
- Mother's choice
- Father's choice
- Advice of doctor
- So child looks like father
- So child looks like his brothers
- So child looks like other kids
- Health reasons
- Believe circumcision is dangerous
- Believe circumcision is too painful
- Sexual function (pleasure)
- Born premature
- Not necessary
- Child adopted
- Item you wrote in above

At this time, would you make the same decision regarding your child's circumcision?
- Yes
- No

Was there ever a time in the past where you reconsidered your decision to circumcise or not circumcise your child?
- No
- Yes

If yes, how old was your child when you first reconsidered your decision?
- 0 to 2 months
- 3 to 6 months
- 7 to 12 months
- 13 to 18 months
- 19 to 24 months
- 25 to 30 months
- 31 to 36 months

Where did you receive information about the circumcision procedure?
- Friends
- Mother's side of the family
- Father's side of the family
- Childbirth class instructor
- Obstetrician (OB/GYN)
- Pediatrician
- Nurse
- Midwife
- Other medical provider
- Computer/internet
- Television/radio/newspapers/magazine

When were you asked about your decision to circumcise or not circumcise your child?
- Before baby born
- Delivery room
- In hospital
- Routine baby check-up
- I was not asked

Which medical provider asked you about your decision to circumcise or not circumcise your child?
- Obstetrician
- Pediatrician
- Nurse
- Midwife
- Childbirth class instructor
- Other medical provider
- No medical provider asked

Do you feel you were provided with enough information from your medical provider regarding circumcision?
- Yes
- No

Did your medical provider understand (respect) your decision to circumcise/not circumcise your child?
- Yes
- No

On a scale from 1 to 10 (with 1 being least satisfied and 10 being most satisfied); how satisfied/content are you with your previous decision to circumcise or not circumcise your child?
- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10

If you would like to comment on the survey or explain any of your answers, please feel free to use this space:

(End of survey)

REFERENCES
Circumcision: We Have Heard From the Experts; Now Let's Hear From the Parents
Robert Adler, MsED*; Sandra Ottaway and Stacey Gould
Pediatrics 2001;107;e20
DOI: 10.1542/peds.107.2.e20

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