Orthodontist-patient relationships and treatment satisfaction

Part two of two

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Methodology
Given the social/psychological nature of this research question, a qualitative methodology was chosen because it is best suited to explore dynamic human behaviors rather than a quantitative method (Seidman, 2006). This research study pursued an empirical phenomenological methodology because it “... involves a return to experience in order to obtain comprehensive descriptions that provide the basis for a reflective structural analysis that portrays the essence of the experience.” (Moustakas, 1994, p. 13)

The variables associated with understanding patient-doctor relationships were not easily quantifiable and required understanding a patient’s experiences with his/her orthodontists because feelings are not discrete, numeric or constant; they evolve over the course of a relationship and may manifest differently at various times. The best way to understand patients’ experience was to allow them to express themselves through a survey as the instrument of choice.

Three different populations were surveyed. The first two participant groups were randomly selected from two orthodontic clinics and the third population was a self-selected peer group. Surveys were printed and distributed in March 2018 and collected in October 2018. The two clinics included a private practice in Irvine, Calif., (Group 1-A) and the Herman

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See SATISFACTION, page 8
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Be sure to spend time at the Planmeca booth (No. 1547), like these attendees, to get a glimpse of the company’s full line of 2-D and 3-D imaging and scanning products.

Visit the team of the Myofunctional Research booth (No. 811) to learn about appliances to correct malocclusion.

Norma Luna of Shofu Dental (booth No. 281) helps attendees make sure they go home with the products they need.

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You can’t miss the stunning entrance to the ClearCorrect booth, No. 1825. Be sure to head inside for a special presentation.

At right, GC Orthodontics America officials take time out for a photo op with attendees Saturday morning at booth No. 2247.

Above, Dr. John Graham speaks on ‘SLX 3D: Self-Ligation Perfected’ at the Henry Schein Orthodontics booth, No. 1925. The booth has speakers between 11 a.m. and 2 p.m. each day.

Rick Matty, VP and GM of Digital Solutions for Ormco (booth No. 1101), offers attendees a preview of Spark, its new clear aligner system.

Dentsply Sirona Orthodontics (booth No. 1301), including GAC and Raintree Essix, keeps things running smoothly with digital treatment planning.

Brian Ganey at Carbon (booth No. 2063) talks to attendees about the company’s ground-breaking printers.
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Ortho School of Dentistry at USC Advanced Orthodontic Clinic (Group 1-B). The final group was chosen from current Herman Ortho School of Dentistry students (Group 2-A) who had completed orthodontic treatment in the past.

In soliciting participants for the study, the attending orthodontist and this researcher attained permission from patients before administering the survey. Study participants from the two clinics (i.e., Group 1-A and Group 1-B) received the survey from their orthodontists and were asked to return the completed survey to the front desk staff.

Because survey participants from Group 2-A were current Herman Ortho School of Dentistry students, they were asked to complete the survey directly by this researcher.

The survey was administered to 27 adults, 19 females and eight males. Requirements for participant selection were individuals who (a) completed full treatment fixed maxillary and mandibular orthodontic brackets for at least 12 months, (b) were older than age 18 and (c) resided in the greater Los Angeles area.

The survey instrument was designed with questions identifying age, gender and race in the first section. It was important to include and emphasize age and gender because dentofacial appearance has a negative correlation with age (i.e., as an individual ages, dental appearance satisfaction decreases), this correlation was especially true among women (Al-Omiri & Abu Alhaija, 2006). According to Al-Omiri and Abu Alhaija, personal identifiers were important because gender identity and age affect initial perceptions of appearance.

In the second section of the survey, a list of 14 questions was asked and measured on a Likert scale (i.e., 1 to 5) (Likert, 1932). The Likert scale was used because it is a common form of measurement for an individual’s attitudes on a given topic. Participants were asked to rank how much they agreed with a question or how satisfied they were with a scenario on a scale of 1 to 5 — one represented very dissatisfied or very disagreeable, response and five represented very satisfied or very agreeable. The data were collected, recorded and analyzed in a Microsoft Excel spreadsheet in October 2018. The survey data results are available in Figure 1.

Survey instructions
The following instructions were presented at the top of the survey.

*Please complete the two sections below. The first section is strictly biographical. The second section asks you to reflect on your orthodontic treatment. Please respond to all 14 questions to the best of your ability. All of the questions in this section are based on a 1 through 5 (e.g., 1=Very Dissatisfied to 5=Very Satisfied). Please note that your responses will remain anonymous and none of this information will be shared beyond the scope of this research.

**Survey questions**
- How satisfied are you with the result of your orthodontic treatment?
- Were your initial expectations for your smile met by the orthodontic treatment you received?
- How satisfied were you with your personal relationship with your orthodontist?
- How big of a role did your personal relationship with your orthodontist play in meeting those expectations?
- How much did your orthodontist make you feel like you were his/her priority?
- How important of a role did the orthodontist’s technical attributes play in meeting the expectations of your treatment?
- Did you feel like your orthodontist spent enough time with you during each visit over the course of your treatment?
- How comfortable were you in expressing your concerns to your orthodontist during treatment?
- Was your orthodontist interested in listening to you?
- How satisfied were you with the overall result of your teeth after completing your orthodontic treatment?
- Are you satisfied with the esthetics and function of your teeth?
- Are you satisfied with the esthetics of your teeth?
- How would you rate your overall experience with your orthodontist?

Data collection and limitations
There were two noticeable challenges during the data-collection phase. First, the patients who satisfied the participant criteria was limited. Also, patients returned to their orthodontists’ offices after completing treatment infrequent, slowing down data collection. In addition, patients who had braces in the past may not remember the nature of the relationship with their orthodontist. This was especially true for current Herman Ortho School of Dentistry students — many of whom had full appliance therapy more than 10 years prior to this research study.

Asking orthodontists to allocate extra time to recruit survey participants was an additional burden on patients. This may have affected survey results from both the private practice and USC’s Advanced Orthodontics Clinic. This researcher was not present in the private practice nor in the USC clinic when the surveys were distributed. If the surveys were distributed by the orthodontists, with their treatment, participants may have felt less pressure to input favorable responses and might have been more critical about their relationship with the orthodontist.

**Organization**
The survey questionnaire offered respondents the opportunity to rate questions on a 1 through 5 scale. In the data analysis phase, responses were grouped into three categories — satisfied (4 and 5), neutral (3), and dissatisfied (1 and 2) to order, analyze and interpret data from the 27 respondents.

**Data analysis**
Participant responses were generally consistent for most questions. When participants were asked how satisfied they were with treatment, all respondents that they were satisfied (4 and 5). Most participants responded that they were “very satisfied” (5). All of the participants were satisfied (4 and 5) with the “overall experience” with their orthodontist. Twenty-five of 27 respondents said they were also satisfied (4 and 5) with the personal relationship with their orthodontist (see Figure 1).

Survey results suggested patients who were satisfied with their orthodontic treatment also had positive relationships with the orthodontist, suggesting that some relationship exists between patient-orthodontist relationships and patient satisfaction. Responses to questions eight and nine suggested respondents were comfortable talking with their orthodontist about their treatment and expressing concerns.

The most variable response was how big a role a patient’s personal relationship with the orthodontist played in meeting expectations for their smile. Participants as a whole were unsure about how much any personal relationship with the orthodontist may have impacted their treatment.

Variability of this response did not imply that patients who were satisfied with their orthodontic treatment also had positive relationships with the orthodontist. Patient expectations about his/her smile throughout treatment seemed to evolve over time, so the effect of the doctor-patient relationship on meeting expectations or falling short suggested little about the quality of that relationship.

There was also variability to question 7: “Did you feel like your orthodontist spent enough time with you during each visit over the course of your treatment?” Data suggested the amount of time a doctor spends with his/her patient may vary and spending more time with a patient may not mean the patient will have a better (or worse) doctor-patient relationship. The data also suggested the quality of the interactions may be more important.

**Conclusion**
This research sought to explore a pathway for improving patients’ orthodontic outcomes. The literature pointed out that quality of care was an important factor in achieving high-quality outcomes. One facet of addressing “quality of care” was patient-doctor relationships, and

**About the author**
Angelica Chaghouri is a Santa Monica native who graduated from the University of California, Los Angeles in 2014 with a bachelor of science in psychology. She is a third-year dental student at the Herman Ortho School of Dentistry of USC and expects to graduate in 2020. After graduation, Chaghouri hopes to continue her education in an orthodontic residency program and pursue her dream of becoming an orthodontist. She enjoys playing beach volleyball, cooking and spending quality time with friends and family. She can be contacted at achaghouri@usc.edu.
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This study examined whether such relationships impacted patient satisfaction.

Through a qualitative research methodology, implementing the use of surveys, data were gathered on patient-doctor relationships among three sample populations. The conclusions drawn from the data suggested patient-orthodontist relationships do matter for patient satisfaction and orthodontists who pay attention to the relationship with each patient can often achieve a higher quality of care.

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**By Dewitt Blankenship,**
Manager of Dolphin Management, Mobile and Web Software Products

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**EXHIBITORS**