



SCHOOL OF DENTAL MEDICINE
CASE WESTERN RESERVE
UNIVERSITY

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Re: NORD Grant Application

Dear UCITE Committee Members:

Worldwide, dental fear and anxiety are major problems for dental professionals. Many children and adults are afraid of dental treatment. This fear of the dentist tends to take root in early childhood and in many cases, does not diminish as the patient ages. In fact, it can even increase in intensity as time passes. As a result, many children and adults neglect to procure regular preventive treatment, let alone more serious procedures. 75% of the population feels at least some stress when visiting a dentist. Furthermore, 20% of the population cannot visit a dentist due to their dental fear. Patients with dental fears tend to have more oral health problems than patients without dental fears. To treat dental fearing patients, deep sedation or general anesthesia is often required due to the patients' behavior and extensive dental needs. The high cost of treatment financially impacts individual patients as well as social economies supported by governmental dental insurance, such as Medicaid. Finally, as dental fear is passed down through the generations – a parent who fears the dentist is less likely to take their child to the dentist for routine dental care – a cycle of poor oral health is created that is difficult to overcome.

80% of patients with dental fear acquired their dental fear through direct and indirect experiences during their childhood. Pediatric dentists play an important role in preventing and overcoming patient fear. To provide evidence-based care, they would benefit from understanding behavioral science as it relates to dental fear and anxiety. Currently, the School of Dental Medicine's curriculum does not have a comprehensive course focusing on dental fear and anxiety.

I am requesting the NORD grant to aid in developing a behavioral science course for pediatric dental residents and dental students which will include behavioral science theory and applied research.

To accomplish this, I would like to purchase a camcorder to record patient behavior and a hard drive on which to securely store the video clips on the server at the School of Dental Medicine. I also plan to invite two experts of behavioral science from outside the university to give lectures. Funds from the grant will be used to cover travel costs to present this newly developed course content during a professional meeting such as the International and American Association for Dental Research (IADR) General Session or The American Dental Education Association (ADEA) Annual Session & Exhibition.

At the University of Washington School of Dentistry, I was course director of a course entitled "Clinical Management of Fearful and Phobic Patients" for three years before coming to Case Western Reserve University. To date I have conducted over twenty behavioral science research projects. These experiences and data will be used to develop this course. The course will contain both didactic and research project sessions. The didactic session taught by CWRU professors and guests will include the etiology of dental fear,

the fundamental theories of emotions and behavior, clinical behavior control techniques for patients with dental fear, and behavioral science research methodologies. Sessions will begin with brainstorming and will culminate in the presentation of research projects.

The evaluation of the subjects' behavior, psychological state, and background is essential to conduct clinical behavioral science research. Thus, to record behavior and store the data, we need a camcorder and a hard drive. With this equipment, numerous behavioral science research projects will be conducted.

At the end of the course, dental students and pediatric dental residents will be able to:

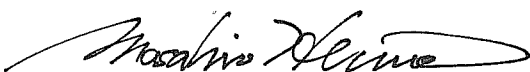
1. Understand behavior problems in dentistry
2. Understand behavioral science
3. Understand how to apply behavioral science in the students' clinical practice
4. Conduct behavioral science research projects

Developing this course at the School of Dental Medicine will add an approach toward behavior management of the child with dental fear and anxiety.

Please find the attachment including the detailed budget and descriptive justification.

Thank you very much for your consideration. Please let me know if you require any additional information.

Sincerely yours,



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