

大学院特別講義

医歯学先端研究特論

Special Lecture of Advanced Medical and Dental Study

(生命理工学先端研究特論) (医歯理工学先端研究特論)

Oral health and a new dental industry

The presence of bacteria in the bloodstream is referred to as bacteremia. The tooth surface is intensively colonized by bacteria, where it is estimated that more than 100 billion bacteria per gram of wet weight. There are also abundant bacteria on the dorsum of tongue. In our study, up to 300 different bacterial species have been isolated from a single oral cavity analyzed by pyrosequence. These tremendous number of bacteria gain entry into the bloodstream from a breakage in small blood vessels that are located in the neighbor of the dental plaque. Therefore, prevention of odontogenic bacteremia is the truly important problems of our time. We established plural systems of oral bacterial examinations by outsourcing systems. BML Incorporation has Japan's largest nationwide service network of medical examination. They provide oral bacterial examination services. GC Corporation has GC SALIVA-CHECK LAB which provide the outsourcing system of oral bacterial examinations. We developed a new therapy system for eradicate oral pathogenic bacteria named as The Dental Drug Delivery System (3DS). Saliva test for detection of pathogens by outsourcing system cost more than US\$100. If fifty million people will receive the saliva test per year, 5 billion US\$ industry was produced. 3DS cost almost US\$1000. If fifty million people will receive the 3DS treatment, 50 billion US\$ industry was produced.

Dr. Nobuhiro Hanada

Professor Department of Translational Research,
School of Dental Medicine,
Tsurumi University



February 8th, 2017 15:00-

at Demonstration room

Building 7 Faculty of dentistry and animal research center 5F

保存・矯正示説室 7号館5階

contact Dr.Otsuki otsuki.ope@tmd.ac.jp
Cariology and Operative Dentistry