



Oral Health and Your Baby or Child with Special Needs

Regular visits to the dentist
Preventive actions for professionals
Oral health in the home



global child dental fund

How to use this booklet

A baby or child with special needs is defined as someone who requires specialized attention due to a disorder or systemic disease, either through having a physical disability and/or a developmental limitation, be that mental, sensory, behavioral, cognitive or emotional. Patients with these conditions require specialized medical care and specific measures to ensure they integrate safely into a dental environment. The participation of guardians and caregivers in the consultation and dental process is crucial to the successful implementation of oral health strategies, both in the professional dental care and at home. It is with parents and caregivers in mind that we have decided to develop a guide to promote oral health care for infants and children with special or medical needs.

If you find this booklet helpful, even a small donation to the Global Child Dental Fund will greatly help disadvantaged children all over the world gain access to dental care and wear a healthy smile for life.

2



global child dental fund www.gcdfund.org



Regular visits to the dentist

What is the ideal time for a first visit a dentist?

The best way for a family to deal with a new situation or problem is to have the correct advice and information on hand as soon as possible. Before engaging with the dental process, parents should consult with the child's doctor and clarify any general concerns they have relating to their child's health. They should consult with a dentist at the earliest possible opportunity to ensure good oral health measures are introduced and implemented at the earliest possible stage of the child's development. It is important to note that good oral health is integral to overall health; changes in your child's health could affect their oral health, and vice versa.

Some syndromes and diseases have oral health implications or manifest as oral symptoms. Some patients with special needs will require a more specialized approach when engaging with the dental process. However, this is not the rule. Many patients with special needs can enjoy regular dental care.

When scheduling an appointment with the dentist, it is important to give as much information as possible about your child's condition. This will ensure the dentist and all of the dental team are prepared for your visit and are equipped to attend to the specific needs of your child. This can avoid unnecessary embarrassment or anxiety for the child and family; and for the dental team themselves.

If your child has had a prior visit(s) to a dentist, you should provide their dental history. Providing as much information as possible enables the dentist to create a treatment plan based on your child's needs. It ensures there will be better collaboration between the dentist and the parent(s)/ caregiver during the first visit.

It's essential to begin the routine of visit dentist since the first baby tooth comes. Good oral health is integral to overall health.

Anamnesis / Patient History

The first thing you do at the dentist's surgery is to fill out a questionnaire. The information provided in the questionnaire gives the professional an insight into the medical history of your child: their personal data, their medication, the condition of their oral health and the general condition of their health. This is called the Anamnesis.

This is your opportunity to give the reason for your visit, to voice any concerns and to outline the specific needs of your child. You must give short but concise answers. Every detail is important as the information is used to formulate the dental treatment plan. You must let the dentist know if the child is averse to touch or is sensitive to light or noise. Likewise, give details of limitations of movement or if your child is averse to being placed in specific positions. In general, make the dentist aware of anything that might generate fear or adverse stimuli in your child. Give details of all the specialists or professionals that have treated or are treating your child. Provide their contact details as the dentist may need to contact them to clarify issues relating to your child's health.

4

Initial conversation with the dentist

With the information provided in the questionnaire, the dentist can then meet with the parents to gain a deeper insight into the child's condition and to learn more about their medical history and daily routine. A thorough knowledge of a patient's history helps eliminate risk and allows for a better diagnosis. It also makes it easier for the dentist to create an effective plan of treatment. The relationship between the professional, the family and the child is of paramount importance. A good working relationship between all parties is crucial if health promotion initiatives are to be drawn-up and implemented successfully.

Clinical examination.

The dentist begins the clinical examination with a thorough examination of the mouth, head and neck of your child. The dentist will make an assessment and identify the dental procedures required. Additional tests may be necessary. For example, your child may require imaging tests such as x-rays, CT scans, or MRI. He or she may be referred to a doctor for other specialized medical examinations.



Treatment plan

The dentist prepares a treatment plan. It is formulated using the information garnered from the anamnesis and the oral examination. The results of any additional tests will inform the plan as well. The treatment plan contains all the dental procedures required as well as instructions for oral home-care. (Preventive and early intervention curative dental care can greatly improve the oral health of children with special needs. Similarly, educating the patient, family or caregiver on preventative dental care and oral homecare can lead to benefits in the child's oral health).

The dentist will assess the potential risk of dental caries (tooth disease), periodontal disease (gum disease), dental erosion (wear and tear of the tooth) or interference in the growth and development of the orofacial complex. Some children with special needs may need to be administered drugs to decrease salivary flow (This in turn can increase the risk of oral diseases). A multidisciplinary approach towards the patient's care is recommended. A doctor, dentist, speech therapist, physiotherapist and nutritionist should participate and collaborate in the process. This approach addresses the specific needs of the child and ensures he or she can enjoy a good quality of life.

6

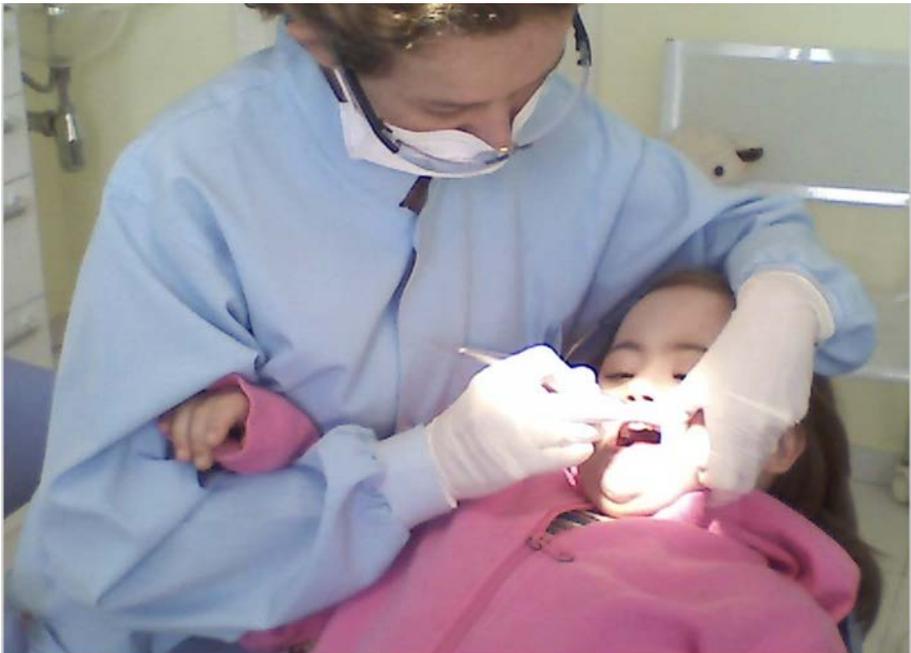
Changes in your child's behavior, due to communication difficulties or a learning disability may impede the first consultation. Remember, this is normal behavior. Children who have had negative experiences of dental treatment in the past require more time to adapt. They may hamper the dentist's work or impede the initial examination. Don't become discouraged! Solutions are available. The dental visits can be structured according to individual requirements. Appointments can be scheduled to suit the needs of the child. The duration and frequency of the consultations can be tailor-made to allow the child to acclimatize to the dental environment. In general, the whole process should facilitate a gradual adjustment to the environment and alleviate any negative expectations the child may have.

The most effective ways to ensure good oral health in your child is to follow a preventive strategy and to bring them to the dentist regularly,

normally at quarterly intervals. Preventive measures for improving oral health, if implemented from the newborn stage, can assist in the natural development of oral functions such as sucking, swallowing, chewing, breathing and speech. Introducing preventative measures at an early stage contributes to a healthy mouth. Preventive dental care will form a part of the treatment plan.

Dental care

Your child can enjoy safe and stress-free dental care. However, a child may display resistance behaviors or refuse to participate in the process. There may also be involuntary actions at play. These behaviors can interfere with the performance, effectiveness and safety of care. In such cases, a strategy may have to be drawn-up for the use of physical restraints that immobilize movement. This is only done to stabilize and protect your child. Restraints can include devices for local containment; a dental mouth opener, for example. The dentist can also consider devices that restrict the movement of the head, limbs or body.



Physical restraints are never used without prior discussion with the child's parents or caregiver(s). Every option is discussed and clarified beforehand, before being authorized by the parties.

Some children will require medication to secure their well-being during the process, (for example, those suffering from diabetes, heart diseases or hematologic disorders). Medication might also be used to reduce anxiety and fear.

In circumstances where a physical restraint is not possible or where the child is contraindicated, it may be necessary to carry out the dental procedure under a light or moderate sedation. This allows the child to relax and facilitates his or her collaboration in the process. If deemed necessary, the dental procedures may take place in a hospital environment with the child under deep sedation or a general anesthetic.

The dentist may plan a course of action that combines several of the conditioning and emotional collaboration techniques described above.

8

Parents and caregivers should respect the individual collaboration of each child according their motor, cognitive and emotional capacity.

Preventive actions for professionals

● Dental caries

As a means of preventing dental caries in infants and children with special needs, the dentist can undertake a number of procedures. For example, the professional cleaning of the teeth followed by a topical application of fluoride and chlorhexidine. The dentist can also apply teeth sealants (material that seals the cracks of the teeth) or apply materials that seal open cavities caused by tooth decay.

● Periodontal disease

Periodontal disease (gum disease, which can also reach other tissues supporting the teeth) in children is often associated with an underlying systemic disease or with immune disorders. A preventive strategy will

be implemented. It will include the regular examination of the gums, frequent visits to the dentist for teeth cleaning and the removal of calculus (Tartar). The dentist may prescribe a chlorhexidine-based mouthwash or prescribe medicines that fight gum disease.

- **Dental erosion**

Dental erosion is defined as the irreversible loss of tooth structure due to chemical dissolution by acids not of bacterial origin. The tooth structure is lost due to chronic exposure to acids, from food, beverages, medicines, frequent vomiting or acid reflux. The dentist may need to apply dental products to prevent or decrease tooth sensitivity. Dental restorations may be considered. The dentist can also recommend a toothpaste that helps regenerate tooth enamel.

- **Growth and development of the orofacial complex**

Deciduous teeth begin to grow in the mouth between the ages of 24 and 36 months. Professional supervision in the early stages of growth is an integral part of dental treatment in early childhood. The monitoring of this process is essential to the success of preventive actions and it ensures the teeth grow correctly in the mouth. The dentist evaluates the position of the teeth and dental ridges, then modifies the treatment accordingly, with the aim of encouraging the growth and development of the orofacial complex (sucking, chewing, swallowing and nasal breathing). At this stage, it may be necessary to collaborate with an Otolaryngologist, a speech therapist and/or a physical therapist. Oral-based behaviors requiring medical and psychological treatments, such as the clenching of teeth and teeth grinding (bruxism) are quite common, as are other oral habits, such as the use of pacifiers, baby bottles or sucking. During the deciduous stage (milk or baby teeth), orthodontic and orthopedic measures can be applied to correct the position of the teeth and ridges.

- **Oral injury prevention**

A dentist will encourage parents and caregivers to introduce injury preventative strategies into the daily routine of the home and at school. Such measures can be used to ensure children don't injure themselves

when in the cot, in the bath, or when sitting on a person's lap. Likewise, preventative measures reduce the potential for injury when the child is using a stroller, walking aid or wheelchair. The potential for oral trauma is high because in early childhood the child is exploring the world around him. Early childhood is the time where children learn to stand up in the crib, and where they learn to crawl, stand, walk, run and play. Parents and caregivers must also be conscious of motor control and protection reflexes. Oral injuries can occur during the daily routine, when the child is being fed or washed, for example. The biting of lips, cheeks or the tongue can occur during these activities.

The many potential risks highlight the importance of providing guidelines for family and caregivers in the prevention of accidents, injuries and oral trauma in children. If an oral trauma occurs, the parent or guardian should consult with a dentist immediately or bring the child to a children's hospital .

Oral health in the home

Oral hygiene

Cleaning the mouth as part of a personal hygiene routine is crucial in the prevention of tooth decay (dental caries), infection of the gums (gingivitis) and oral disorders (thrush). Always follow your dentist's advice as regards the specific needs of your child.

Oral hygiene and the use of toothbrushes and toothpaste should begin when the first baby tooth appears in the mouth. The teeth should be brushed two to three times a day. The most important times to brush the teeth are after breakfast and at bedtime. Always follow the same routine: start at the same end of the mouth and move to the other side, the upper teeth first followed by the lower teeth. It is not uncommon for the child to resist by screaming, closing the mouth or turning the head away. Children cope better in a situation if they understand the whole concept and not just parts of it. In the context of brushing the teeth, the process should be presented in stages. Firstly the instruments: floss, toothbrush, toothpaste. Secondly, the environment and facilities: the



sink, faucet and water. Thirdly, the specific actions: opening the mouth, allowing the adult to place a hand in the child's mouth and spitting. And, lastly, the sensations: taste, smell, touch and textures.

Using a degree of calm and creativity, you can demonstrate how all these stages come together as part of the overall tooth brushing experience. Explain and demonstrate. Brush your own teeth so that the child can see what is involved and can gain a better understanding of the process. Using a single mirror can also improve the learning process. The child should participate in every part of the process, within his or her capabilities. At the end of the process, when the child is feeling clean and refreshed– the parent or caregiver should give the child praise – “we did it!” Constant praise is a valuable tool.

At the outset, the establishment of a routine may seem like an overwhelming task, but be patient. The learning process involves both the parents and the child. Eventually, ‘brushing your teeth’ will become a natural part of the everyday routine.



Tips:

Devices to facilitate the opening of mouth: Some babies and children will be resistant to oral hygiene because of their limitations. Dentists have developed devices to keep the mouth open and static. The devices prevent gagging and the biting of cheeks or tongue. They will protect your child and ensure a professional service of the highest standard.

Bedi Devices to facilitate the opening of mouth at home.



Bedi Devices to facilitate the opening of mouth in the dental office.



Dental floss: Although there is no consensus among dentists on the benefits of dental floss, flossing is recommended for babies and children whose teeth are too close together. There are special devices available to make flossing easier.

Toothbrush: A wide range of children's toothbrushes are available on the market. The size and softness of their bristles are suitable for the mouth of a baby or child. Electric toothbrushes with special cables are available to allow the child to brush their own teeth. However, a parent or caregiver should always supervise the tooth brushing process. They should brush the child's teeth if the child is not capable of doing so.

Toothpaste: The child's toothpaste must contain fluoride. It is recommended to begin toothbrushing on the appearance of the first tooth. Read the package: concentration of fluoride from 1000 PPM of fluoride. Use the following amount:

It's essential to begin the routine of oral hygiene using a toothbrush and toothpaste since the first baby tooth comes:

- Babies and children who can't spit = amount equivalent to a grain of uncooked rice (up to 0, 1 g)
- Children who have the ability to spit = amount equivalent to a pea grain (up to 0, 3 g)



The establishment of a good routine requires consistency and patience on the part of the parent or caregiver. Choose an environment where the child feels safe and secure. Ensure it is well-lit. Keep the child calm and relaxed. Playful stimuli can encourage participation and it helps establish the routine. So, sing a song or tell a story. Make it a time of enjoyment; one the child equates with fun. Everyone likes to receive praise, so always praise and encourage the child. Show a lot of affection during the process. This will improve the relationship and increase the trust between you and the child.

Feeding

Feeding practices introduced in early childhood influence eating behaviors in later life. Good nutrition and food is essential for the growth and development of your child. A doctor or nutritionist may advise a specific diet for a child with special needs. Parents should prioritize healthy meals and healthy snacks, and establish good feeding practices from the outset.



- Watch the consistency of foods to avoid gagging. However, be aware that patterns of sucking, swallowing and chewing encourage a dynamic interaction between all the muscles and joints of the mouth. These behaviours could interfere, favorably or unfavorably, with orofacial growth and development.
- Malnutrition during the period of tooth development may lead to defects in the formation of the teeth and delay dental eruption.
- Avoid damaging practices that increase the risk of tooth decay. For example, letting a baby fall asleep with residues of sugar, honey or other matter stuck to their teeth; or prolonging the use of baby bottles. Children with motor difficulties tend to keep food in their mouth for longer periods. This can be detrimental to oral health as it hinders self-cleaning.
- The pathological decay of teeth, commonly referred to as dental erosion can be caused by changes in the eating pattern or by the high consumption of acidic soft drinks or juices.
- It is important you establish a healthy feeding regime for your child and keep similar time intervals between meals. Although tooth decay is caused by imbalances in the oral flora, diet can also be a contributory factor. Take care to avoid food and medicines containing sugars as they are highly cariogenic.

Other booklets in this series:

Oral Health and Your Pregnancy

Visiting the dentist during pregnancy
Common oral health problems in pregnancy
Oral health advice

Oral Health and Your Baby

Breastfeeding Bottle Feeding Pacifiers
Teething and the first visit to the dentist
Diet and baby teeth
Oral hygiene
Most frequent oral diseases
Prevention of dental trauma

Series authors (from left to right):

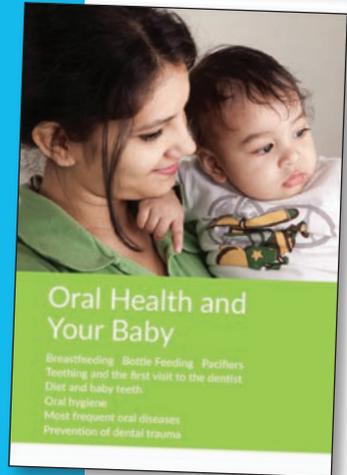
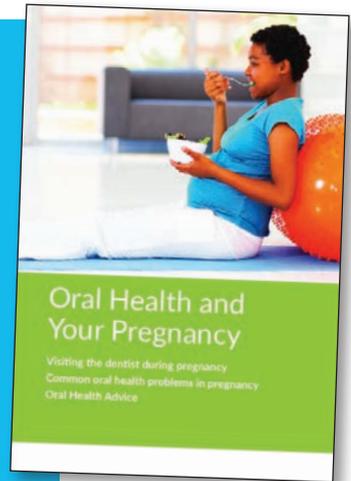


Dóris Rocha Ruiz DDS, MSc

Sônia Groisman DDS, MSc, PhD

Valerie Wordley BDS

Raman Bedi BDS, MSc, DDS, FDSRCS(Ed),
FDSRCS(Eng), FGDP, FFPH, Doctor of Science
(Univ. Bristol), Doctor of Humane Letters
(AT Still Univ., Arizona)



If you have found this booklet helpful, even a small donation to the Global Child Dental Fund will greatly help disadvantaged children all over the world gain access to dental care and wear a healthy smile for life.



global child dental fund

Email: info@gcdfund.org **Visit:** www.gcdfund.org

Global Child Dental Fund, Rooms 329-331, 26-29 Drury Lane,
London WC2B 5RL Registered charity no: 1125850 (England & Wales)