Ora-Aid

Attachable Intraoral Wound Dressing
Safe, Easy & Effective

A New Paradigm for Intraoral Healing
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Implantation
Immediate Implantation
Two-step Implantation
Socket grafting
Flap Operation / Frenectomy
Ora-Aid and Periodontal Pak
Extraction
I&D / Mucousdamage
Ora-Aid and Temporary denture
SCTG
FGG
CLP

Q&A 36
This product is non-eugenol protective dressing material applied to intra-oral wounds.

- Advanced concept in intraoral dressing
- Protects oral wounds from food and cigarette smoke
- Aids in hemostasis
- Protects suture thread from tongue irritation
- Strong adhesion using hydrophilic polymer
- Safe and easy to use. Easy to cut into different shapes/sizes
- Self adhesive with saliva
- Reduces irritation sore in mouth
- Mint flavor reduces halitosis

**Features & Benefits**

**Attachable in mouth**

A new concept pasting intra-oral wound dressing

**Protecting wound**

Preventing secondary infection and wound, protects the wound from external stimuli

**Long duration**

Attachable in the oral cavity (Maxillary:6~12hrs / Mandible:4~6hrs)

**Healing effect**

Aids pain relief, protects cure-helping growth factors, protects wound during early wound healing period
**Intend to use & Indication**

Applicable to any cases in the oral cavity to protect intraoral wounds

- Protect wounds after oral surgery and treatment
- Promote healing after oral surgery and treatment
- Canker sore
- Protect suture thread from tongue irritation
- Protect sore from orthodontia
- Protect fluorine vanish or sensitive teeth

![Various medical images related to oral cavity conditions](image)

**TBM Ora-Aid Video**

![Video preview](video_preview)
Principal of interaction

01 Absorption of excessive exudate

Too much secretion makes wounded area macerated

02 Remains Healing Growth Factors on the surface of the wound

White Blood Cell, Macrophage, Proteolytic Enzyme Cell, Growth Factors

03 Protects Wound from temperature variation

Insulation improves blood supply and circulation, and makes cell move actively

04 Protects Wound from infection, external stimulus

Foods, smoke, infection factors
1. Irrigate wound with sterile or saline solution
2. Cut Ora-Aid into a proper shape and size
3. Slightly remove moisture with gauze on the wound. An excessive exudation may reduce its adhesive strength and its use time
4. Remove transparent release paper and apply on wound
5. Gently press Ora-Aid for 5 to 10 seconds while Ora-Aid adheres to wound (According to circumstances, please press repeatedly)

**Incorrect usage case**

- At moving mucosa and tongue
- Too much saliva and blood
- At dry wound
- Do not use on Chronic ulcer cases
- Space created due to incorrect attachment

**Recommendations for use of product**

Compared to the movable mucosa, the attachment time is extended at the attached gingiva, Maxillary, and plate
CAUTIONS

⚠️ This medical device is for single use. If reused, the product may cause infection, cross infection, and inflammation. This product shall be disposed in accordance with disposal regulation of each CA for fear of infection.

1. Please carefully read the instructions before use.
2. If you experience any swelling, allergic reaction, upset stomach or any signs of infection, consult with your doctor.
3. If the product is removed forcibly, the wound may come off. The attachment side automatically falls off when it dissolved completely in the mouth.
4. Remove the dropped protection layer from the wound.
5. Pay particular attention if it is being used on young children under 5 years old.
6. The time of attachment may be reduced when stimulated by tongue or food.
   - A notice to the user and/or patient that any serious incident that has occurred in relation to the device should be reported to the manufacturer and the competent authority of the Member State in which the user and/or patient is established.

Storage

1. Store indoors (1°C ~ 35°C) in a clean place.
2. Avoid fire, direct sunlight, and high temperature environment.
   - This product may be hardened according to the storage and management method. Although its adhesion lasts at least 4 hours, the attachment method and the environment may result in longer or shorter adhesion times.
   - Some bubble on the surface of the strip are from the manufacturing process and are safe.
## Products

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Test Reports / Quality Certificates

- Microbial Limit Test
- Acute systemic Toxicity Test
- Cytotoxicity Test
- Subchronic systemic toxicity
- GMP
- ISO 13485
The test results showed that Ora-Aid has a much better pain reduction effect than the existing products.

Periodontal Pak (Left) and Ora-Aid (Right) were applied after modified Widman flap

(Pain scale)

(Visual analogue scale for the assessment of postoperative pain)

* Reference: S University Dental Hospital, Korea
Postoperative pain, bleeding, dietary discomfort and hypersensitivity Proven effectiveness!!

**Severity of discomfort**

(Severity of discomfort (VAS score) in surgical sites with and without attachable periodontal wound dressing)

* Significantly different (P < 0.05). SD: standard deviation, Vas: visual analogue scale.

Ora-Aid protects the intra-oral wound from the foreign substances, reducing pain, bleeding and dietary discomfort, increasing patient satisfaction.

75% of the subjects selected surgical sites using attachable wound dressing.

Patient Satisfaction!

(Surgical Site Satisfaction Survey)

Without ORA-AID 7%
No difference 18%
ORA-AID 75%

Increasing patient satisfaction!
Excellent healing effect

Ora-Aid has identified excellent wound healing and rapid collagen production at excision/inflammatory model in the oral cavity.

* Reference: CNU Biomaterial R&B Center

Excision model

<table>
<thead>
<tr>
<th>3 days</th>
<th>7 days</th>
<th>14 days</th>
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Burn model

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Excellent healing effect

promotes excision healing in the mouth and preserves growth factors in the base of the wound surface for a long time.

Excision model Day 3, Epithelial GAP decreased

A. Organizational photo

Without ORA-AID

OR-AID

B. Epithelial GAP

Burn model Day 3, Burn area decreased

A. Organizational photo

Without ORA-AID

OR-AID

B. Epithelial GAP

C. Burn area

A. Organizational photos of the excision acquired on the 3rd day after surgery (H&E chromosome, Scale bar 1,000um)  
B. Graphs that measure and compared Epithelial gaps in each sample  
C. Comparative analysis graph of burn area

* Reference: CNU Biomaterial R&BD Center
Through K167, which is a cell differentiation marker, it can be confirmed that the Curatick application group shows more cell differentiation on the 7th day of the burn model, which promotes nearly healing with increased collagen levels.

**Excision model Day 7, Increased distribution of cell differentiation marker K167**

<table>
<thead>
<tr>
<th>A. Organizational photo</th>
<th>B. Collagen concentration</th>
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<td>Without ORA-AID</td>
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<td>ORA-AID</td>
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**Burn model Day 7, Increased distribution of cell differentiation marker K167**

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<td>ORA-AID</td>
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* Reference: CNU Biomaterial R&B Center
Excellent healing effect

Increase collagen levels means more tissue regeneration factors, faster healing of wounds. Reproduction confirmation of more mature blood vessels (v), collagen fibers (cf) on the 14th day of the burn model. This not only facilitates initial healing but also confirms that the quality of healing is excellent.

Excision model Day 14, blood vessel and collagen level increased

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<tr>
<th>A. Organizational photo</th>
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<tr>
<td>![MT stain Image J](Without ORA-AID)</td>
<td><img src="ORA-AID" alt="Collagen concentration" /></td>
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Burn model Day 14, blood vessel and collagen level increased

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A. Organizational photos of 3rd day after surgery (mt chromosome)  B. Collagen(%) measured and analyzed for each sample

* Reference: CNU Biomaterial R&BD Center
CLINICAL CASE
Implantation 1

#22 Horizontal root fracture can be seen in the radiography

Socket after extraction.

Grafting with Bond Apatite (Augma)

Exposed graft is protected by absorbable collagen sponge plug (Heliplug) secured in place above the graft

Ora-Aid adhesive wound dressing is trimmed to fit the area

Ora-Aid is placed above

Temporary maryland bridge for aesthetic purpose

Soft tissue appearance 4 weeks post op

3 months post op

Bone formation can be seen in the CBCT slides

Implant placement

Ora-Aid placed over

Surgery: David Baranes D.M.D
Dressing with Ora-Aid

After 10 days

After 7 days

After surgery & suture

Dressing with Ora-Aid

After 1 month

Implantation 3

#13, Implant failure. Bone grafting for reinforcing the bones of the insufficient ulitis

suture

Dressing with Ora-Aid

After 10 days

After 7 days

Dressing with Ora-Aid

After surgery & suture

Implantation 2

Case by Dr. Kim Jaeyoon

Case by Central Dental Clinic
Implantation 4

Before implant

Panoramic shooting to check the location of the implant

Wiping the surgical site and blood control after implant placement.

Cutting the Ora-Aid to attach it on the wound suitably

Right side application (the retention time is depends on the attachment method)

Left side application

Postoperative panoramic imaging
Immediate Implantation

Before implant

Surgery

After surgery & suture, dressing with Ora-Aid

Excellent blood clot was formed on next day

After 2 weeks

After 1 month

Case by Dr. Kim Jaeyoon
Cut Ora-Aid into a proper shape and size. 

Dressing with Ora-Aid

After two weeks. Attached gingiva formation

Applying healing abutment after 3 months. Using Ora-Aid reduces operation time and protect surgical sites to make blood clot.

Case by Good Morning Dental Clinic

Case by Dr. Yedameun Dental Clinic

Apply Louis Button with healing abutment

After a week, blood clot formed.

After two weeks. Attached gingiva formation

two-step Implantation 1

Two-step Implantation 2

Apply Louis Button with healing abutment

After surgery & suture

Cut Ora-Aid into a proper shape and size

Dressing with Ora-Aid
#24 extraction.
apply Bond Apatite graft

Cut Ora-Aid into a proper shape and size

Fixation sutures to keep the Ora-Aid patch in place until soft tissue proliferation will bridge the exposed gap

10 days post op, complete closure of the exposed gap by soft tissue proliferation
Socket grafting 2

Ora-Aid can be used in various cases (Implantation, Extraction, Periodontal surgery, orthodontic appliance, ulcer and etc)

After extraction of tooth, apply Bone graft

After applying Ora-Aid + Suture Process, it protects the affected area and bone graft from external stimuli (food, tongue, and etc)

Easy to attach / Easy to suture

Ora-Aid’s protective layer keep protection of the affected/surgical area with silk.
It prevents external stimuli through the barrier. And this helps/promotes natural healing effect.

Case by Dr. David Baranes
#36 Fractured with pain.

Extraction, and socket debridement

Socket grafting with Bone Apatite (Augma)

Sutures above Ora-Aid to maintain it in place for a long time until it's absorption. Ora-Aid is quite effective to dress bleeding or oozing wounds and to protect the wound for longer time when sutured above the exposed Bond apatite, enable soft tissue proliferation above the graft.

After 10 days

Suture removal.
Uneventful healing with soft tissue proliferation above the graft can be seen.
Use laser to perform labial frenectomy

Apply Ora-Aid which is transparent and aesthetic, thin to minimize feeling of irritation

#14,15 Suturing after removed inflammatory tissue from the tooth cavity and mucosa

Protect the donor site. Provide pain relaxation. Block external stimuli.

Case by Leeyoungseok Dental Clinic
Before surgery

Apply the auto-tooth bone graft & membrane (absorbent)

#16 Implant placement

Suture

Apply Ora-Aid for protection, pain relaxation, and blood control -> Apply Periodontal Pak above on the Ora-Aid

10 days later, remove Ora-Aid & Coe-pak

Through applying Ora-Aid under the Coe-pak, blocks plague formation and provides pain relaxation
(When remove Periodontal Pak from the surgical sites, it usually causes pain because it adheres with silk)
Before surgery

Apply the auto-tooth bone graft & membrane (absorbent)/ #25 Implant placement

Suture

Apply Ora-Aid for protection, pain relaxation, and blood control

Apply Coe-pak above on the Ora-Aid (makes Ora-Aid duration time longer)

14 days later / remove Ora-Aid & Coe-pak
#22, 23, 24, 25 implantation. Check width and cool to 7mm to 10mm. Use bone grafting and synthetic bone to repair the broken parts and use absorbent shielding film.

Suture

Application of Ora-Aid for rapid Blood clot formation

Extend the attachment time using a Periodontal Pak over the Ora-Aid.

After 10 days. After removing the Ora-Aid and the Periodontal Pak.
After an incision of mucosa, remove the supernumerary tooth.

Apply Ora-Aid above on the open socket to protect blood clot and help hemolysis.
Incision and drainage: I&D

#15 Visits by Pain Appeal Implementation of I&D to remove inflammation

Apply Ora-Aid (25mm*15mm size)

Remove the drainage, and apply Ora-Aid to prevent periodontitis

Mucous membrane traumatic damage

oral ulcer occurred after surgery (cuts by braces, self biting, etc)

Attach Ora-Aid to prevent secondary infection. And it provides pain relaxation
Temporary denture 1

Case by Dr. Carlos Adriano

#11, 13, 21, 22 Extraction

#21, 22 Apply bone graft

#21, 22 Attach Ora-Aid on the surgical site after applied bone graft

#21, 22 Suture with Ora-Aid to prevent loss of bone graft for a long time

#11, 13 Attach Ora-Aid on the surgical site (protects socket, aids pain relaxation)

#11, 13 Apply Ora-Aid after suture

By using an Ora-Aid, it protects the area of surgical site and eliminates pain caused by temporary dentures.

Ora-Aid is thin and does not affect the intersection between denture and gum. And enable rapid recovery of patients with cushioning(wall) roles during the adaptation period.
Dressing with Ora-Aid

Suture

Dressing with Ora-Aid

Ora-Aid is Reducing irritation in gum tissue formation

Temporary denture 2

Temporary denture 3

Suture

Dressing with Ora-Aid

Case by Leeyoungseok Dental Clinic

Suture

Dressing with Ora-Aid
Subepithelial connective tissue graft

Graft Insertion

Obtain graft tissue

Pain Management is Excellent for the Soft tissue Augmentation

After suture apply Ora-Aid

After 1 week donor site

Gum discoloration

After 1 week recipient site

After 6 month
Free gingiva graft: FGG

Obtain subepithelial connective graft tissue of palatal side

Recipient site dressing with Ora-Aid

Secondary protection with flipper

After 3 week recipient site

After 3 week donor site

#45 #46 no attached gingiva / free gingival graft Insertion and Suturing

Donor site dressing with Ora-Aid

After 1 week donor site

Case by Dr. Kim Jaeyoon

Free gingiva graft: FGG
Crown lengthening procedure: CLP

Case by Leeyoungseok Dental Clinic

Before CLP

Preparation periodontal flap operation

Suturing

Dressing with Ora-Aid

After 1 week

After 3 week
Q. Needs to remove protection layer?
Ora-Aid is composed of two layers, protection layer and attachment layer. When the attachment layer dissolved completely with moisture/saliva in mouth, the protection layer will fall off automatically. So, no need to remove protection layer by force.

Q. Doesn’t stick well? / Fall off too fast?
Usually it is caused by incorrect attachment on the surface of the wound and affected area. Cut Ora-Aid into a proper shape and size accordance with the wound. When attach Ora-Aid, it should be combined with some amount of moisture.
If there are too much moisture, slightly remove with gauze on the wound and gently press Ora-Aid 5~10 seconds to make high adhesion. We also recommend customers to attach Ora-Aid to hard tissue.
If you attach to soft tissue, it may not last long due to the movement of soft tissue muscle. We also recommend customers to attach Ora-Aid to hard tissue.
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Q. How long the adhesion remains normally?
Normally, Ora-Aid stays around 4~6 hours on the wound. And it depends on each case because the attached circumstances are not same.

Q. Ingredients?
It is made of polymeric materials, including hydroxy ethyl cellulose. All raw materials are listed on KP&USP standards.

Q. Could be stay more than 2~3 days?
Ora-Aid's attachment duration is normally 4~6 hours on the wound. The main purpose of Ora-Aid is to increase natural healing effects of oral tissue with preserving growth factors through the absorption of exudate especially during prime time. In addition, it provides protection to the wound area against secondary infection. Through this early stage protection for several hours, it can help with the effect of initial wound healing.

Q. Can use without suture or can suture it inside tissue?
We do not recommend it. Better to use Ora-Aid after on suture. Ora-Aid is not a membrane which can be used inside of oral tissue.
A New Conceptual Intaoral Wound Dressing Strip

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