Hidradenitis Suppurativa (HS)

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Disclosure

AbbVie A,C,RI,S, G  
Actelion S  
Celgene A,S  
Galderma A,RI,S  
GSK s, A  
InflaRx RI  
Janssen A,C,RI  
Kyowa RI  
Incyte RI  

Leo Pharma A,C,RI,S  
Novartis RI,S, C  
Pfizer A,RI  
Regeneron RI  
Roche RI  
Sanofi2Genzyme A,RI,S  
UCB RI  
Bauch A,S  
BMS RI  

A Advisory Board, C Consultant, RI Research Investigator, S Speaker, G unrestricted educational grant
Objectives:

• To Discuss the pathophysiology of wound healing in HS

• To Highlight the importance wound care as an adjuvant therapy

• To address the factors delaying wound healing in patients with HS

• To propose an algorithm for local wound care in patients with HS
The role of cytokines

Initiation stage

- TNFα
- IL-6

Progression stage

- IL-1β
- MMP 2
- MMP 9
- ↓ TIMP
Wounds and HS
Endogenous Tissue breakdown Mechanism

• Tissue destructive enzymes (MMP)
• An oxidative environment caused by reactive oxygen species
• Impaired endogenous control mechanisms that modulate enzyme activities

Frew et al., Exp Dermatol. 2019 May 29
Biofilms as a Mediator for Chronicity

- Biofilms reform after removal
- Interferes with PMN function and cause releasing proinflammatory cytokines

Clinical signs of Biofilms:
- Recurrence after stopping antibiotic
- Delayed healing
- Multiple flares
- Chronic wound drainage
- Low level chronic inflammation
- Low level erythema
Microbiome of chronic wounds

Kalan et al., 2019, Cell Host & Microbe 25, 641–655
Factors that Delay Healing in Patients with HS

- Inflammation
- Anemia
- Poor nutrition
- Smoking
- Co-morbidities
- Medications
- Friction

Huang and Alavi et al JCMS 2019, In press
Wound Management

- Set the desired outcome
- Address the underlying Inflammation
- Manage Co-morbidities
- Local wound care

TIME
Day to day care

Post surgical wounds
Wound Bed Preparation

TIME

Tissue Debridement

Infection/Inflammation

Moisture

Edge

TIME
The Choice of Dressings

- Patient preference
- Exudate
- Access
- Cost
- Bioburden
- Pain
- Wound shape
- Peri-wound skin
- Location
- Edema
Comprehensive management of underlying disease (HS)

HS- Local Wound + Dressing Guide

Post-Surgical Wounds
- Simple
- Complex/Non Healing

Non-surgical Wounds
- Exudate
  - Heavy: A
  - Mod: B, C
  - Mild: C
- Malodor or signs of critical colonization
  - E

A: Superabsorbent, Absorbent
B: Foams, Silicone adherent, gelling fibers, calcium alginate
C: Non adherent dressings
D: gel based dressing
E: Dressings with antiseptics
F: NPWT, Growth factors, cellular and acellular skin replacement material, other advanced therapies

Proposed algorithm

Most affordable: Adult briefs, sanitary napkins, diapers, or gauze held in place with tape or surgifix

Plain foams, absorptive dressings, abdominal pads

Personalised dressings: antiseptics, silicone, Etc.
Basic dressings

- Absptive/ adherent
- Non adherent
- Vaseline
- Skin substitute
- Net ting/ clothing
- Negative Pressure

Day to Day
Surgical
Summary

• Inflammation is the main cause of non healing in patients with HS

• Anemia, poor nutrition, Biofilms and planktonic bacteria delay healing in patients with HS

• It is important to set the ideal outcome for each patient and encourage the desired outcome communication
No one can whistle a symphony alone, it takes an orchestra to play it