

AAD **ANNUAL MEETING 2025**

**AEDV** 7 - 11  
MARZO  
ORLANDO

highlights



# HIDRADENITIS SUPURATIVA

**Dr. Héctor Perandones González**

*Complejo Asistencial Universitario León*

Una iniciativa de:



Con el patrocinio de:



AAD **ANNUAL MEETING 2025**

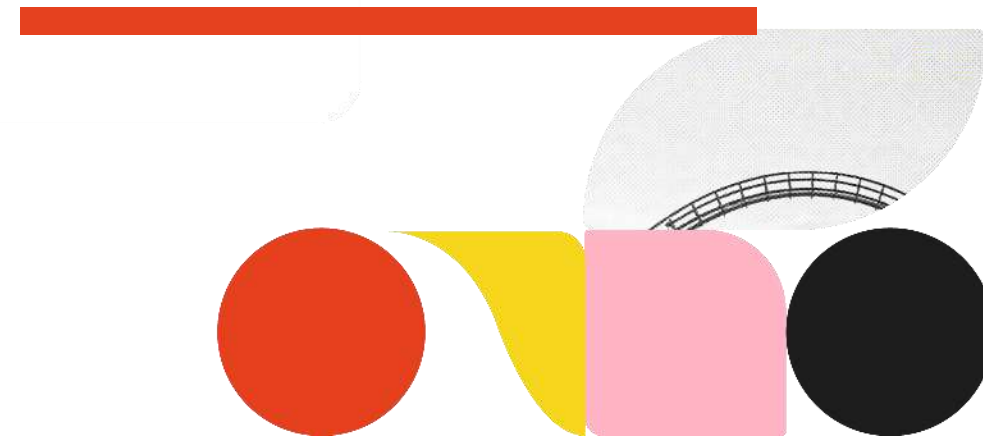
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**NO TENGO CONFLICTOS  
DE INTERÉS**

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# HIDRADENITIS SUPURATIVA

101 POSTER y 3 SESIONES MONOGRÁFICAS

1. COMORBILIDADES
2. TRATAMIENTO MÉDICO
3. TRATAMIENTO QUIRÚRGICO
4. TRATAMIENTO BIOLÓGICO
5. NUEVAS MOLÉCULAS

Una iniciativa de:



ACADEMIA ESPAÑOLA  
DE DERMATOLOGÍA  
Y VENEREOLÓGIA



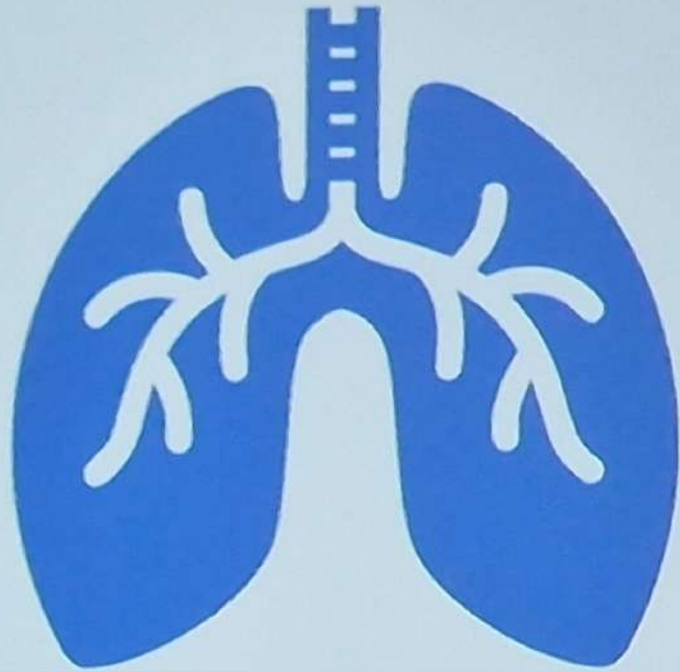
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*Highlights 2025*



Con el patrocinio de:





## Association of HS with Respiratory Diseases

- Asthma (10.5%): **OR 1.23**
- Sleep Apnea (5.9%): **OR 1.27**
- COPD (5.1%): **OR 1.53**
- Sarcoidosis(0.3%): **OR 1.60**





## Chronic Kidney Disease and HS

- The prevalence of CKD is 6.3%.
- The odds ratio (OR) for CKD is **1.51**

*Almuhanna et al. J Dermatol 2023*

- Younger 18–39 yrs **OR 2.11**
- Female gender **OR 1.23**
- Non-smokers **OR 1.13**
- No diabetes **OR 1.24**
- No cardiovascular disease **OR 1.38**

	Generally safe	Dosing adjustment	Caution/Avoid
Antibiotics	Doxycycline Clindamycin	Ertapenem	Minocycline
Antiandrogens	progestin-only pills (POPs)	Metformin (mild CKD)	Metformin (in ESRD) Spironolactone Combined OCPs
Immunosuppressives/ Biologics	TNFi IL-17i		JAKi Cyclosporine

*Almuhanna et al. J Dermatol 2023*



## HS and Cancer: Which Types Have Higher Risk?

- Hodgkin lymphoma **aHR 5.08**
- Oral cavity and pharyngeal cancer **aHR 3.10**
- Central nervous system cancer **aHR 2.40**
- Nonmelanoma skin cancer **aHR 2.06**
- Prostate cancer **aHR 2.05**
- Colorectal cancer **aHR 1.45**



# Malignancy

## Systemic antibiotics

- Doxycycline (Strong)
- Moxifloxacin, clindamycin, tetracycline, dapsone (Conditional)
- IV Ertapenem: for severe cases (Conditional)

## Antiandrogens

- Metformin (Strong)
- Spironolactone, oral contraceptives (Conditional)

## Immunomodulators/immunosuppressants

- Prednisone: for severe flares (Conditional)

## Biologics

- Secukinumab, Ustekinumab: for pts with history of malignancy *in the last 5yrs* (Conditional)
- Anti-TNFs: for pts in remission for > 5yrs especially low risk (Conditional)



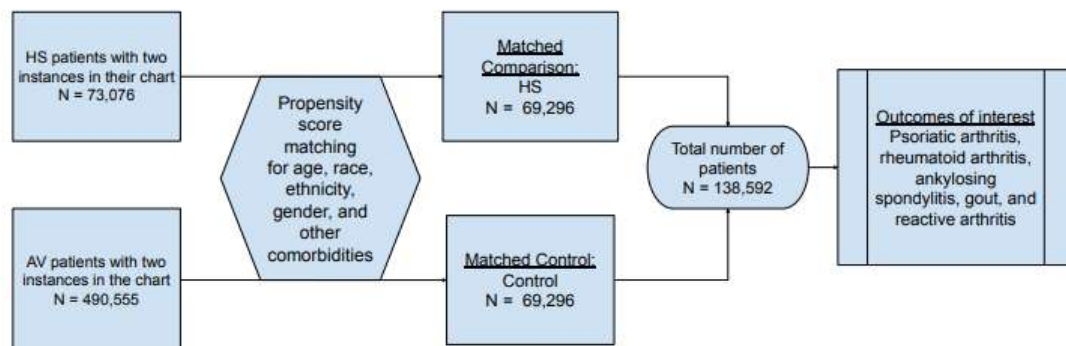
## Association Between Hidradenitis Suppurativa and New-Onset Inflammatory Arthropathies: A Retrospective Population-Based Cohort Study

Henry O. Herrera, BS<sup>1</sup>, Neil Korman MD, PhD<sup>2</sup>

Affiliations:


1 Department of Dermatology, Case Western Reserve University, Cleveland, Ohio

2 Department of Dermatology, University Hospitals Cleveland Medical Center, Case Western Reserve University, Cleveland, Ohio



<b>Outcome</b> (ICD-10 codes used)	3 months RR (95%CI)	1 year RR (95%CI)	3 years RR (95%CI)	5 years RR (95%CI)
<b>Reactive Arthritis (ReA)</b> • (M02*: Postinfective and reactive arthropathies)	1.7 (0.8,3.7)	3.0 (1.5,5.9)	3.1 (1.8,5.5)	2.9 (1.7,4.7)
<b>Psoriatic Arthritis (PA)</b> • (L40.5*: Arthropathic psoriasis)	8.9 (5.2,15.4)	3.7 (2.7,4.9)	3.4 (2.7,4.3)	2.8 (2.3,3.4)
<b>Ankylosing spondylitis (AS)</b> • (M45*: Ankylosing spondylitis)	5.1 (2.6,10.1)	3.2 (2.1,4.9)	2.3 (1.7,3.1)	2.1 (1.6,2.7)
<b>Rheumatoid Arthritis (RA)</b> • (M05*: Rheumatoid arthritis with rheumatoid factor) • (M06*: Other rheumatoid arthritis)	4.7 (3.6,6.1)	2.9 (2.5,3.5)	2.1 (1.9,2.4)	2.0 (1.8,2.1)
<b>Gout</b> • (M10.9: Gout, unspecified)	3.2 (2.4,4.3)	2.1 (1.7,2.5)	1.8 (1.6,2.1)	1.7 (1.5,1.9)





## Hidradenitis Associated Inflammatory Arthritis (HAIA)

- Peripheral > axial SpA
- HLA-B27 Negative
- Non-radiographic SpA

# Inflammatory Arthritis (IA) in HS

## Prevalence of IA:

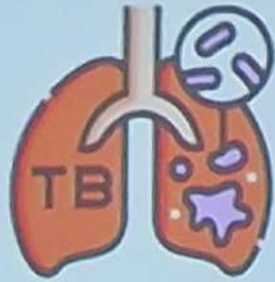
- 25% Morning stiffness > 30 min
- 52% arthralgia
- **23%** had confirmed diagnosis of inflammatory arthritis.

## IA types included:

- Peripheral spondyloarthritis (42%)
- IBD associated spondyloarthritis (17%)
- Ankylosing spondylitis/axial SpA (8%)
- Psoriatic arthritis (8%)
- Rheumatoid arthritis (8%)
- Granulomatosis with polyangiitis (8%)

25% were newly diagnosed as part of the study.

HLA-B27 was NEGATIVE in all IA patients



# Tuberculosis

## Systemic antibiotics

- **Rifampin**: 4-month course to treat latent TB (Strong)

## Antiandrogens

- **Metformin**: as it is associated with low risk of TB infection (Strong)

## Biologics

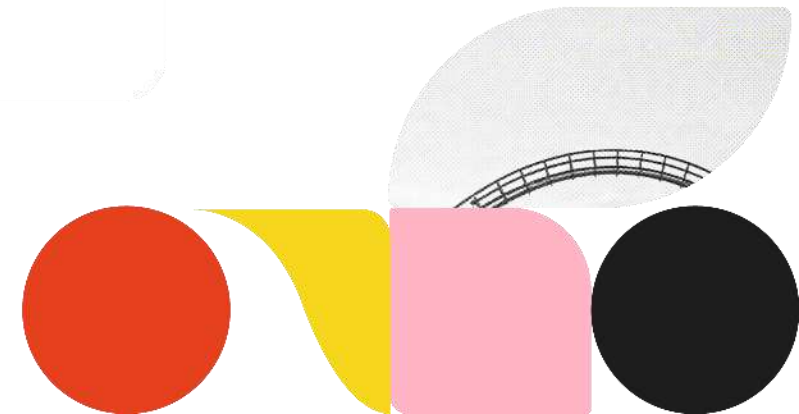
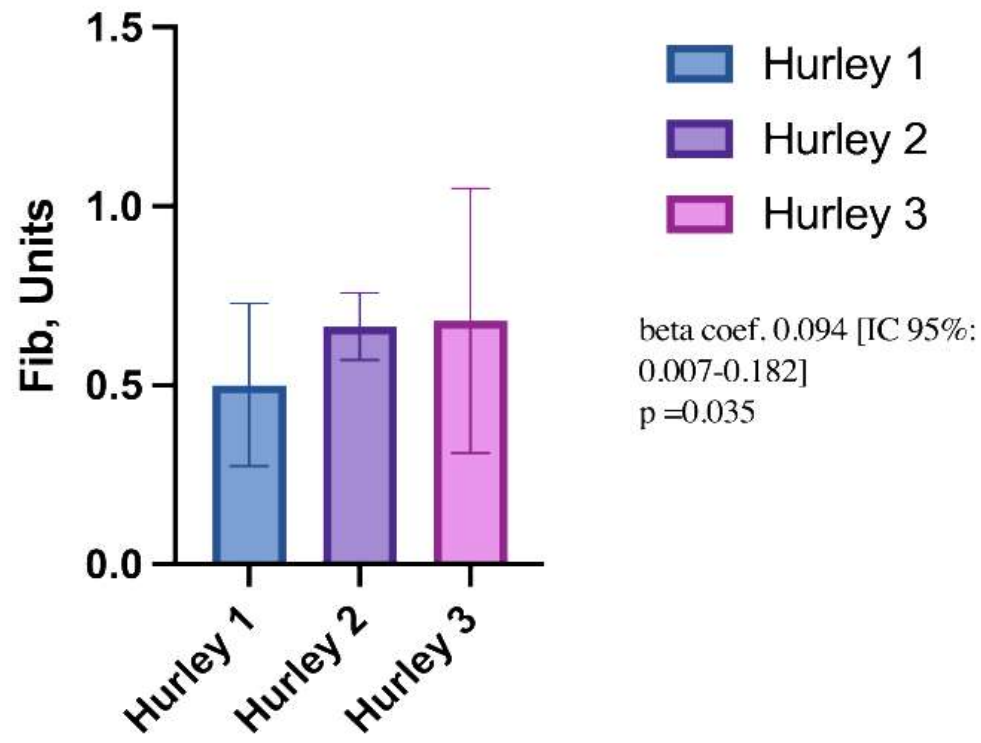
- Screening for TB prior to initiation (Strong)
- Consider **non-anti-TNF** biologics for high risk pts (Conditional)
- Treat latent TB for 1 month prior to initiating **anti-TNFs** (Conditional)
- In latent TB, can initiate **anti-IL17s** concomitantly with anti-TB therapy (Conditional)



# Association Between Hidradenitis Suppurativa Severity and Liver Fibrosis: Role of the FIB-4 Index.

Júlia Mercader Salvans<sup>1</sup>, Vania Lukoviek Araya<sup>1</sup>, Daniel Javier Sánchez Báez<sup>1</sup>, María Luísa Santos e Silva Caldeira Marques<sup>1</sup>, Miguel Quetglas Valenzuela<sup>1</sup>, Jezabel Bravo Medina<sup>1</sup>, Marta García Bustinduy<sup>1</sup> from (1) Dermatology service of Hospital Universitario de Canarias, San Cristóbal de la Laguna, España.

## Relation between Hurley and Fib



## Adverse pregnancy and maternal outcomes in women with hidradenitis suppurativa



Laura Fitzpatrick, MD,<sup>a</sup> Jennifer Hsiao, MD,<sup>b</sup> Rachel Tannenbaum, BS,<sup>a</sup> Andrew Strunk, MA,<sup>a</sup> and Amit Garg, MD<sup>a</sup>  
*Hempstead, New York and Los Angeles, California*

**Table III.** Pregnancy outcomes in women with and without HS

Outcome	Number of cases/total number at risk (%)		Unadjusted OR (95% CI)	Age- and race-adjusted OR (95% CI)	Comorbidity-adjusted OR (95% CI) <sup>a</sup>	P value (comorbidity-adjusted OR)
	Hidradenitis suppurativa pregnancies	Control pregnancies				
<b>Pregnancy outcomes</b>						
Spontaneous abortion	288/1862 (15.5)	7280/64,218 (11.3)	1.45 (1.27-1.66)	1.37 (1.20-1.57)	1.20 (1.04-1.38) <sup>  </sup>	.01
Stillbirth	9/1862 (0.5)	227/64,218 (0.4)	1.37 (0.70-2.66)	1.10 (0.56-2.15)	0.80 (0.40-1.58) <sup>§</sup>	.51
Preterm birth <sup>†</sup>	138/1519 (9.1)	3725/55,628 (6.7)	1.40 (1.17-1.67)	1.25 (1.04-1.50)	1.13 (0.94-1.36) <sup>¶</sup>	.21
<b>Maternal outcomes</b>						
Gestational diabetes mellitus <sup>‡</sup>	197/1703 (11.6)	5318/63,120 (8.4)	1.43 (1.22-1.66)	1.59 (1.36-1.86)	1.26 (1.07-1.48) <sup>**</sup>	.005
Gestational hypertension <sup>††</sup>	97/1594 (6.1)	2754/62,134 (4.4)	1.38 (1.11-1.71)	1.38 (1.11-1.72)	1.10 (0.89-1.38) <sup>††</sup>	.38
Preeclampsia	123/1862 (6.6)	2432/64,218 (3.8)	1.78 (1.47-2.15)	1.57 (1.29-1.90)	1.06 (0.87-1.31) <sup>‡‡</sup>	.56
Cesarean section <sup>§§</sup>	492/1519 (32.4)	15,100/55,628 (27.1)	1.19 (1.10-1.28)	1.19 (1.10-1.29)	1.09 (1.004-1.17) <sup>§§</sup>	.04

# Hidradenitis Suppurativa and Maternal and Offspring Outcomes

Kaiyang LI, BSc; Vincent Pigué, MD, PhD; David Croitoru, MD, MSc; Shu Qin Wei, MD, PhD; Émille Brousseau, MSc; Elizabeth O'Brien, MD; Nathalie Auger, MD, MSc

Table 3. Association of Hidradenitis Suppurativa With Adverse Neonatal Outcomes at Birth

Characteristic	Events, No.		Prevalence per 1000 deliveries		RR (95% CI)	
	Hidradenitis suppurativa	No exposure	Hidradenitis suppurativa	No exposure	Unadjusted	Adjusted <sup>a</sup>
Preterm birth, <37 weeks	133	95 916	100.1	72.8	1.40 (1.16-1.68)	1.28 (1.07-1.53)
Low birth weight, <2500 g	92	73 739	69.2	56.0	1.26 (1.01-1.58)	1.16 (0.93-1.44)
Birth defect	103	77 313	77.5	58.7	1.31 (1.09-1.58)	1.29 (1.07-1.56)
Heart	21	11 919	15.8	9.1	1.73 (1.12-2.69)	1.57 (1.01-2.43)
Orofacial cleft	7	1510	5.3	1.1	4.58 (1.98-10.61)	4.27 (1.84-9.92)
Respiratory distress syndrome	23	19 709	17.3	15.0	1.16 (0.78-1.74)	1.06 (0.70-1.59)
Severe neonatal morbidity <sup>b</sup>	40	30 964	30.1	23.5	1.31 (0.96-1.79)	1.24 (0.90-1.69)
ICU admission	84	67 454	63.2	51.2	1.23 (0.98-1.54)	1.19 (0.96-1.47)
Stillbirth	<5	6176	2.3	4.7	0.48 (0.15-1.47)	0.46 (0.15-1.41)
Neonatal death	8	4018	6.0	3.1	2.11 (1.05-4.21)	1.90 (0.95-3.80)



# Biologics/Small Molecule Inhibitors

Compatible	Use with Caution	Avoid Use
<ul style="list-style-type: none"><li>• Certolizumab</li></ul>	<p><i>More data:</i></p> <ul style="list-style-type: none"><li>• Adalimumab</li><li>• Infliximab</li></ul>	<ul style="list-style-type: none"><li>• Anakinra</li><li>• Apremilast</li><li>• Upadacitinib</li></ul>
	<p><i>Less data:</i></p> <ul style="list-style-type: none"><li>• Secukinumab</li><li>• Ustekinumab</li><li>• Bimekizumab<sup>#</sup></li></ul>	

<sup>#</sup> minimal human data available, animal study did not show harm

# HS & Pregnancy: Treatment Toolkit

## Washes

- Chlorhexidine
- Benzoyl Peroxide

## Topical Agents

- Clindamycin 1%
- Metronidazole 0.75%
- Erythromycin 2%

## Oral Antibiotics

- Clindamycin
- Cephalexin
- Cefdinir
- Amox-Clavulanate
- Metronidazole

## Metabolic

- Metformin

## Supplement

- Zinc  
+ Cu (low dose)

## Biologics

- Adalimumab
- Infliximab
- Certolizumab

## Procedures

- Intralesional  
Triamcinolone
- I&D
- Deroofing

# Deroofing Technique

- Palpate lesion
- Mark lesion
- Local anesthesia
- Insert probe to identify extent of sinus tract





# PUNCH DE-ROOFING AND I&D TECHNIQUES FOR HS

## Punch De-Roofing:

- 4-10mm punch over nodule
- Scrape hole/pouch with curette
- Aluminum chloride, gel foam, bandage

No Packing – not shown to decrease recurrence or 2<sup>nd</sup> procedure

## I&D

- You CAN numb first at incision site, then deeper
- I&D - Scalpel or punch (I prefer punch 😊)
- Avoid packing
- **Intralesional triamcinolone at the wound base**



# Cryoinsufflation

- Insert blunt cannula into sinus tract
- Pulse LN2 for ~5 seconds
- Rest ~3 seconds
- Avoid ice ball at insertion point
- No analgesia
- Acetaminophen first 24 hours





# Multimodal Approach!

- Topicals: Hibiclens wash, BP wash, clindamycin 1%, resorcinol 15%,  
Others?: Ruxolitinib (phase 3), roflumilast, tapinarof, clascoterone
- Systemic antibiotics: doxycycline, clindamycin, Augmentin, Bactrim,  
Keflex, cefdinir, dapsona
  - Combination! Bactrim DS + Keflex; cipro + flagyl; rifampin + flagyl + moxifloxacin
  - Desperate: Linezolid, IV ertapenem
- Hormonal: spironolactone, OCP, finasteride
- Metabolic: metformin, GLP-1 agonist
- Oral retinoid: acitretin, isotretinoin



# Topical Hormonal Therapy

Clascoterone in the treatment of mild **hidradenitis** suppurativa.

Hargis A, Yaghi M, Maskan Bermudez N, Lev-Tov H.

J Am Acad Dermatol. 2024 Jan;90(1):142-144. doi: 10.1016/j.jaad.2023.08.064. Epub 2023 Sep 2.

- Real-world open label use, 10/12 reported clinical improvement on non-validated scale

Topical **finasteride**: A potential therapeutic option for **hidradenitis** suppurativa.

Manfredini M, Alma A, Pongetti L, Sticchi A, Baschieri E, Farnetani F, Pellacani G.

Dermatol Ther. 2022 Nov;35(11):e15837. doi: 10.1111/dth.15837. Epub 2022 Sep 23.

- 4 patient case series with modest improvement



## Hormonal Therapy

- Drospironone-containing OCPs are less androgenic than most other forms
  - » Can be used continuously to suppress menses and pre-menstrual flares
- Spironolactone has promising data
  - » Doses of 100-150 mg are probably needed

Antiandrogen therapy with **spironolactone** for the treatment of **hidradenitis suppurativa**.

Golbari NM, Porter ML, Kimball AB.

J Am Acad Dermatol. 2019 Jan;80(1):114-119. doi: 10.1016/j.jaad.2018.06.063. Epub 2018 Jul 10.

**Spironolactone** in **hidradenitis** suppurativa: a single-center.

Masson R, Park SE, Shih T, Hogeling M, Shi VY, Hsiao JL.

Int J Womens Dermatol. 2024 Mar 19;10(1):e135. doi: 10.1097/JW9.000000000000135.



## Other Hormonal/Metabolic

- Finasteride 5-10 mg daily may help based on case series

Finasteride as a therapy for hidradenitis suppurativa.

Farrell AM, Randall VA, Vafaei T, Dawber RP.

Br J Dermatol. 1999 Dec;141(6):1138-9. doi: 10.1046/j.1365-2133.1999.03224.x.

Antiandrogen therapy in **hidradenitis** suppurativa; **finasteride** for females.

Babbush KM, Andriano TM, Cohen SR.

Clin Exp Dermatol. 2022 Jan;47(1):86-92. doi: 10.1111/ced.14847. Epub 2021 Aug 31.

- Retrospective series support modest potential benefit of metformin (1-2g daily)

» Likely through inflammasome and mTOR pathways

**Metformin** for the treatment of **hidradenitis** suppurativa: a little help along the way.

Verdolini R, Clayton N, Smith A, Alwash N, Mannello B.

J Eur Acad Dermatol Venereol. 2013 Sep;27(9):1101-8. doi: 10.1111/j.1468-3083.2012.04668.x. Epub 2012

Aug 11.



## GLP-1: Hope or Hype?

- 14 articles published on use of GLP-1 agonists (as of Feb 2025)
  - » 2 single patient reports liraglutide and tirzepatide
  - » 1 case series: 14 patients with open-label liraglutide x 3mo
    - 2.5pt DLQI reduction, improvement of inflammatory markers and pain; Hurley 2.6->1.1?
  - » 2 retrospective reviews, 1 database analysis
  - » 8 papers on “potential” of GLP-1 agonists
- 1 in 8 adults in the US has taken a GLP-1 agonist
- 1,517 of 14,710 HS patients (10%) in UNC system have been prescribed semaglutide or liraglutide (tirzepatide not searchable in database yet)
  - » Clinical anecdotal reports feel mixed



## GLP-1: Hope or Hype?

**Semaglutide** use for decreasing **hidradenitis** suppurativa resource utilization: A retrospective cohort study utilizing TriNetX.

Hill MA, Bordeaux JS.

J Am Acad Dermatol. 2024 Nov 28;50190-9622(24)03271-7. doi: 10.1016/j.jaad.2024.11.039. Online ahead

- Decreased antibiotics (RR: 0.758), steroids (RR: 0.839), ER visits (RR: 0.715)
- No difference in biologic use (RR: 0.983).

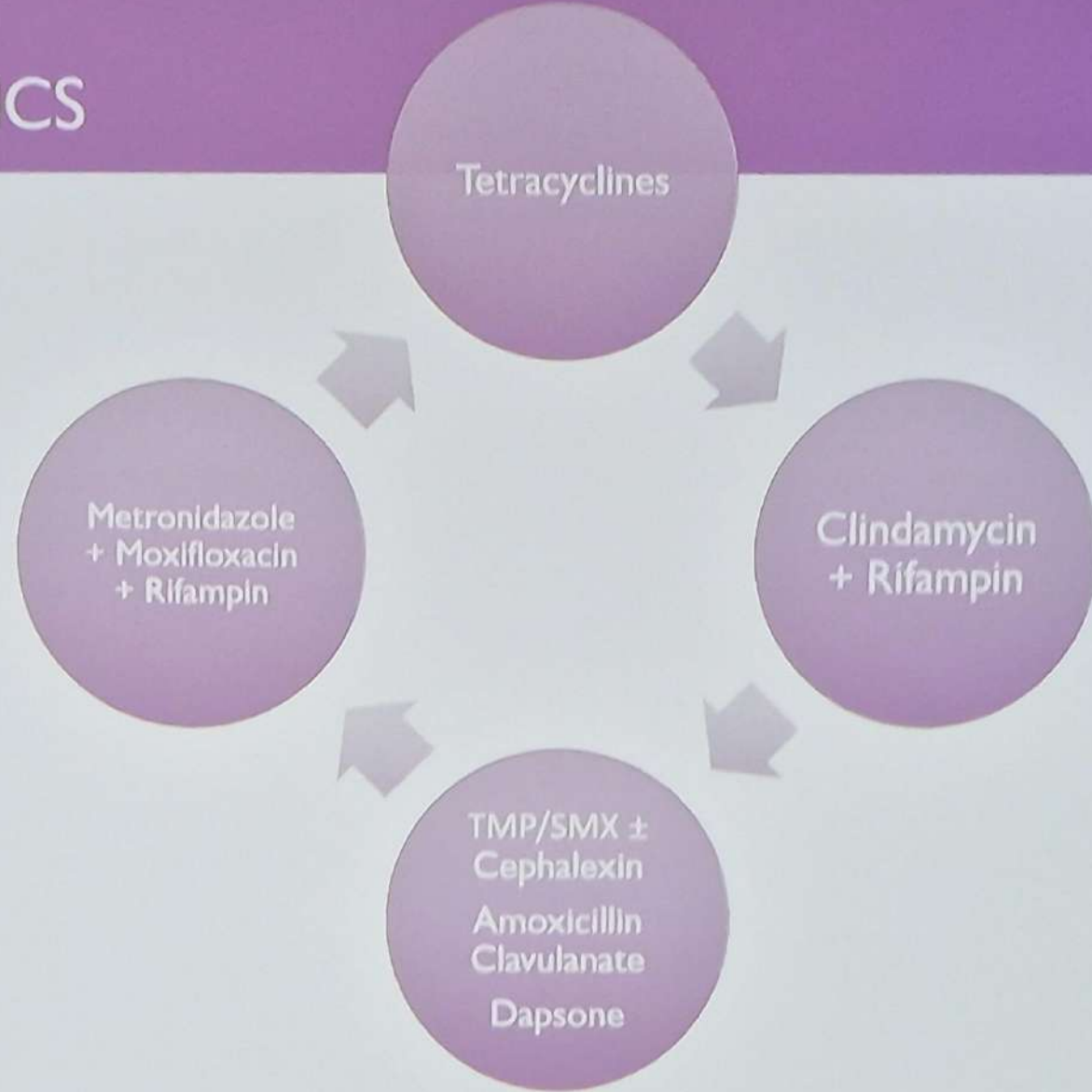
Impact of **semaglutide** use in obese and diabetic patients with **hidradenitis** suppurativa.

Posada Posada MI, Alora MB, Lima XTV.

J Eur Acad Dermatol Venereol. 2024 Oct 19. doi: 10.1111/jdv.20392. Online ahead of print.

- 27 of 45 had HiSCR-like response by chart review
- Most were on other treatment (1/3 biologics), most Hurley I/II

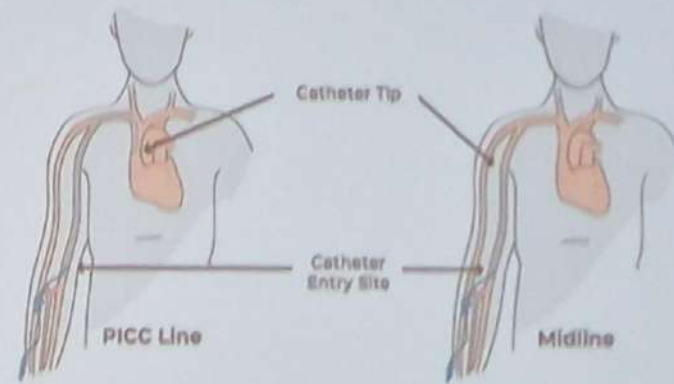
# ORAL ANTIBIOTICS





## IV ERTAPENEM FOR HS FLARES

- Broad spectrum carbapenem antibiotic that inhibits bacterial cell wall synthesis
- Stable against most B-lactamases including ESBL and Gram(-) AmpC-producing bacteria - effective against many resistant organisms
- Covers gram-positive and gram-negative, aerobic and anaerobic bacteria associated with HS lesions
- Used as one-time 6-week course of daily IV infusion before surgical intervention or as a course of rescue therapy
  - John-Lambert et al. found patients receiving ertapenem (1g/day) had a 50% reduction in Sartorius score and clinical remission of Hurley I nodules and 26% of Hurley II lesions<sup>1</sup>
  - Braunberger et al. found in patients with Hurley II and III there was clinical improvement in 97.2% of patients and improved QOL in 85.7% of patients<sup>2</sup>



# MY PERSONAL EXPERIENCE WITH FLARE MANAGEMENT

**There is no comparative study for everything yet...**

## Hospitalized

- Infliximab + PO/IV steroids
- Infliximab + IV ertapenem
- IV ertapenem + PO/IV steroids

## Outpatient (regardless of biologic status)

- Add oral steroids
- Add upadacitinib
- Add rifampin + moxifloxacin + metronidazole
- Add rifampin + clindamycin
- Add TMP-SMX double strength + cephalexin

## Syndromic (PAPA, PASH, PAPASH, PASH, SAPHO)

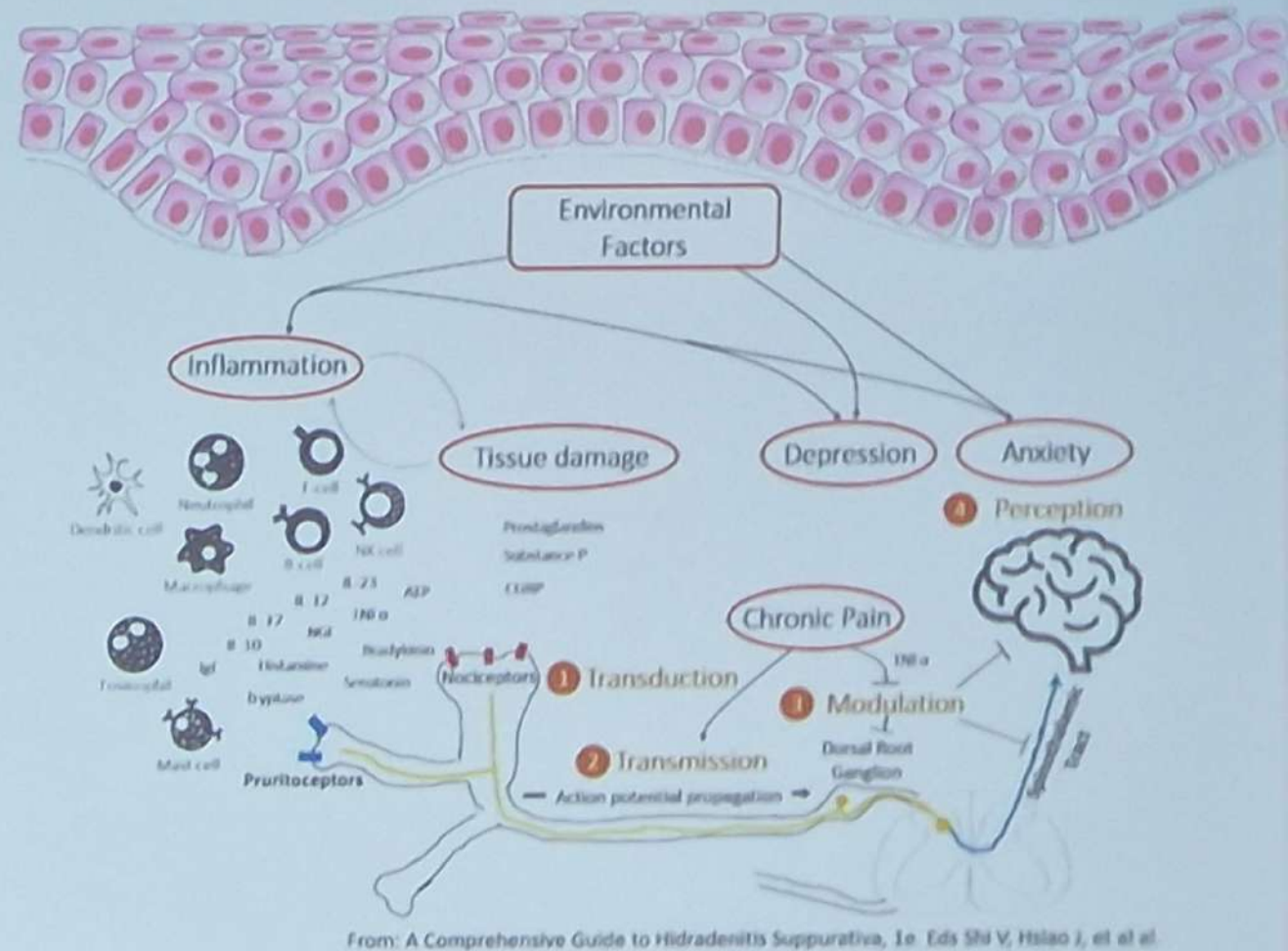
- Add canakinumab or anakinra
- More likely to get infections than non-syndromic HS





# Multiple Mechanisms Drive HS Pain

- **Nociceptive pain** (40%)<sup>1,2</sup>: caused by noxious tissue injury, often described as aching or gnawing
- **Neuropathic pain** (30%)<sup>1,2</sup>: caused by somatosensory nervous system dysfunction, often described as burning
- **Nociplastic pain, aka central sensitization** (36%)<sup>3</sup>: amplified pain perception caused by increased responsiveness of the pain perception pathway in the central nervous system.







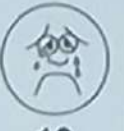
1. Garcovich S. J Clin Med. 2020; 9(12): 4046. PMID: 33333779
2. Huilaja L. JAAD. 2019. PMID: 31730843
3. Aarts P. JAMA Derm. 2021; 157(10):1209-1212. PMID:34406352



# Acute HS Pain Plan

(For Use up to 7 Days in a Row)



<p><b>Step 1</b></p>	 <p>2 A Little Pain</p>	<ul style="list-style-type: none"> <li>• Warm or cool compresses.</li> <li>• Lidocaine 5% ointment up to 4 times daily.</li> <li>• Acetaminophen (Tylenol) 1000 mg every 8 hours as needed.</li> </ul>
<p><b>Step 2</b></p>	 <p>4 A Little More Pain</p>  <p>6 Even More Pain</p>	<ul style="list-style-type: none"> <li>• Prednisone 20 mg every morning for 1 week.</li> <li>• Naproxen 500 mg every 12 hours as needed.</li> <li>• Take omeprazole 20 mg daily on the days that you take naproxen and prednisone.</li> </ul>
<p><b>Step 3</b></p>	 <p>8 A Whole Lot Of Pain</p>  <p>10 Worst Pain</p>	<ul style="list-style-type: none"> <li>• Immediate release opioid, prescribed at lowest dose and for shortest time possible</li> </ul>

## HS Disease-Directed Therapy

and

Screen for pain severity & psychological comorbidities

## Non-Pharmacologic Pain Management

Pain Psychologist

Wound Care

## Pharmacologic Analgesia

Acetaminophen

1000 mg TID

Gabapentin

and/or

Duloxetine

Pregabalin

Venlafaxine

Nortriptyline

## Adjunctive Therapies

*For mild pain or as add on to 1<sup>st</sup> or 2<sup>nd</sup> line systemic therapy*

Topical NSAIDs Topical Lidocaine

## Palliative Care or Pain Specialist Referral

Failed  $\geq 2$  pharmacologic agents

Medically refractory HS with debilitating pain

Ongoing chronic opioid use

## Chronic HS Pain

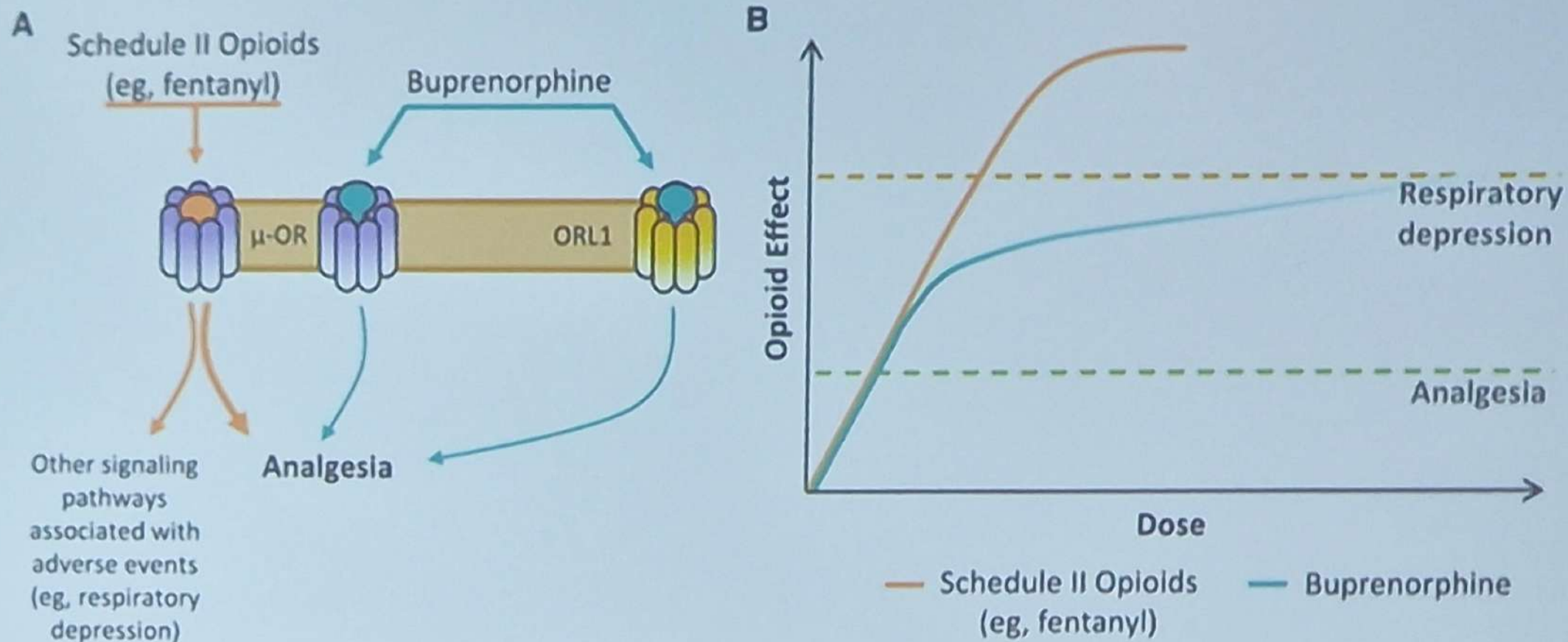


Adapted from: Savage KT. JAAD. PMID; 2021:  
187-199. PMID: 32950543



# Buprenorphine for Chronic Pain

Partial  $\mu$ -opioid receptor agonist





# HOW WELL DO PATIENTS THINK PAIN TREATMENTS WORK?



# Biologics and Small Molecule Inhibitors Under Investigation (or previously under investigation) for HS

## BROAD INHIBITION

### TNF inhibition

- **Injected:**
  - Adalimumab
  - Double-dose Adalimumab
- **Infused:** Infliximab and Golimumab

### IL12/23 inhibition

- Ustekinumab

### P19 inhibitors

- Guselkumab
- Rizankizumab

### IL17 inhibition

#### IL17A

- Secukinumab
- Izokibep

#### IL17A/F

- Bimenkizumab
- Sonelokimab

### JAK inhibition

- Upadacitinib
- Tofacitinib
- Povorocitinib

### Tyk 2 inhibition

- Deucravacitinib

### Others

- Lutikizumab (IL1 $\alpha$ / $\beta$ )
- IL1  $\beta$
- Ox-40 Ligand
- IRAK4
- Complement
- IL36R antagonist
- LTA4
- BTK
- CXCR2

Objective	Adalimumab or Infliximab Drug Concentration
Very low	<3 µg/mL
Low	3-7 µg/mL
Goal	8-20 µg/mL

Vaughn BP et al. Inflamm Bowel Dis. 2015;21(6):1435-  
Vaughn BP. J Clin Med. 2021 Oct 27;10(21):4990  
Abdalla T et al. Am J Clin Dermatol. 2021;22(2):139-14

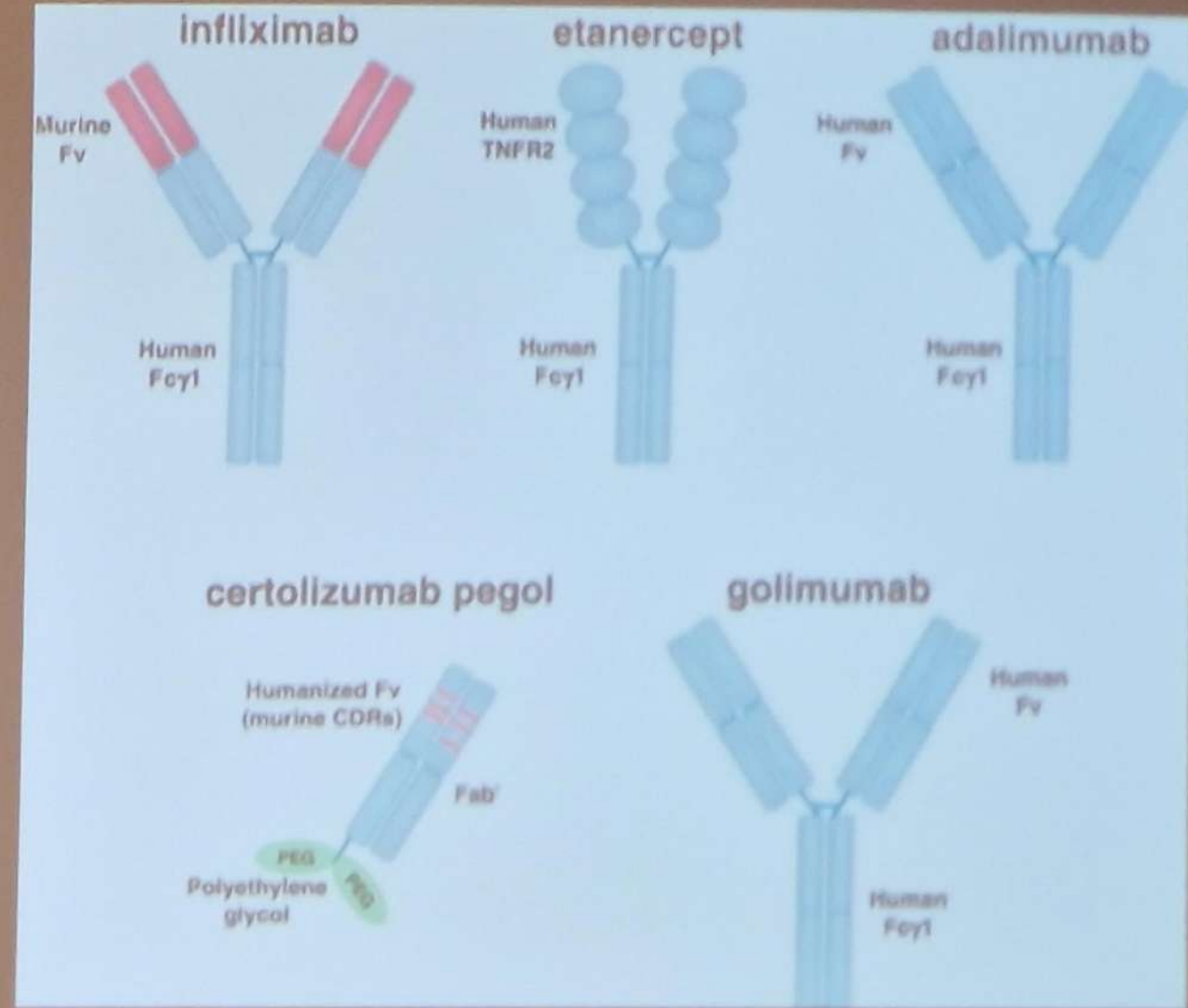


PEARL #1: TNF $\alpha$  inhibitors are first-line biologic for ALL inflammatory comorbidities in patients with HS

	Acne Fulminans	Dissecting Cellulitis of Scalp	Pyoderma gangrenosum	Spondyloarthritis	Inflammatory Bowel Disease
<b>1<sup>st</sup> line</b>	TNF $\alpha$	TNF $\alpha$	TNF $\alpha$	TNF $\alpha$	TNF $\alpha$
<b>2<sup>nd</sup> line</b>	IL-17	IL-17	IL-17	IL-17	JAK
<b>3<sup>rd</sup> line</b>	IL-12/23, apremilast	IL-23	IL-1, JAK, apremilast +/- IL-23 or IL-12/23	JAK, +/- IL-23 or IL-12/23	IL-23 or IL-12/23

## Infliximab/Inflectra/Remicade

- TNF inhibitor that is infused, not injected
- Commonly loaded at 0, 2, and 6 weeks
- Dosed by weight (5, 7.5, or 10 mg/kg)
- Dosed by time (q4, 6, or 8 weeks)
- Evidence in Derm literature is for HIGH DOSE HIGH FREQUENCY treatment in patients with HS
- Max dose is 10 mg/kg every 4 weeks  
HOWEVER we will go higher to achieve goal levels(12.5 or 15 mg/kg)





## Clinical Pearls: IL-17 inhibitors for HS

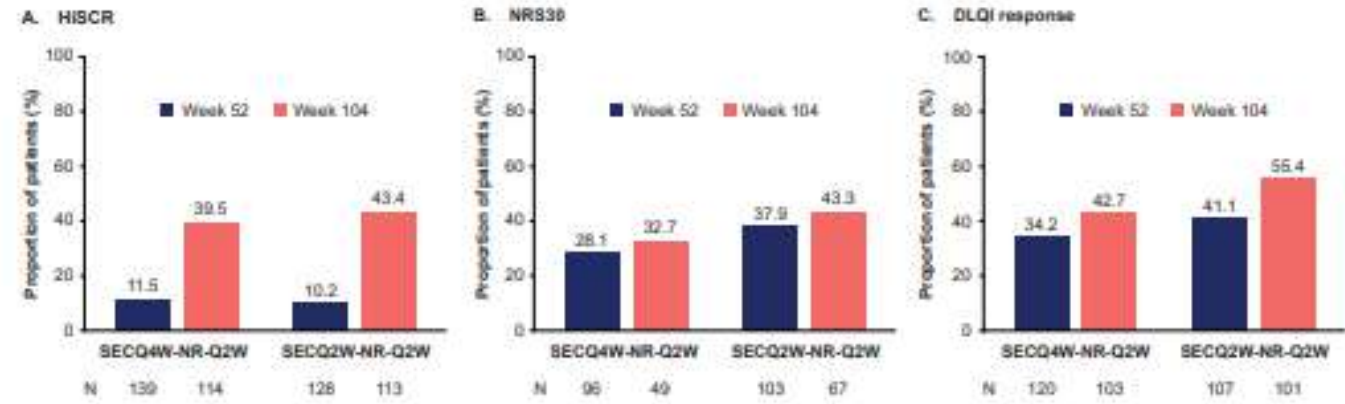
- Secukinumab approved in 2023, Bimekizumab approved in 2024.
- Sonelokimab is an agent to watch.
- Raise expectations with HiSCR75, HiSCR90, HiSCR100
  
- These are slower acting agents- f/u 4-6 months. Sustained response.
- More Candidal and fungal infections observed on bimekizumab (IL17A+F vs IL17A)
- Diligent GI symptom screening before prescribing this class of meds
- Screening for fecal calprotectin with new onset GI symptoms
- Safe to give in older adults, h/o or current malignancy, and MS



**Efficacy of secukinumab uptitration from every 4 weeks to every 2 weeks dosing in week 52 HiSCR non-responder patients with moderate to severe hidradenitis suppurativa: A post hoc analysis of the SUNSHINE and SUNRISE extension trial**

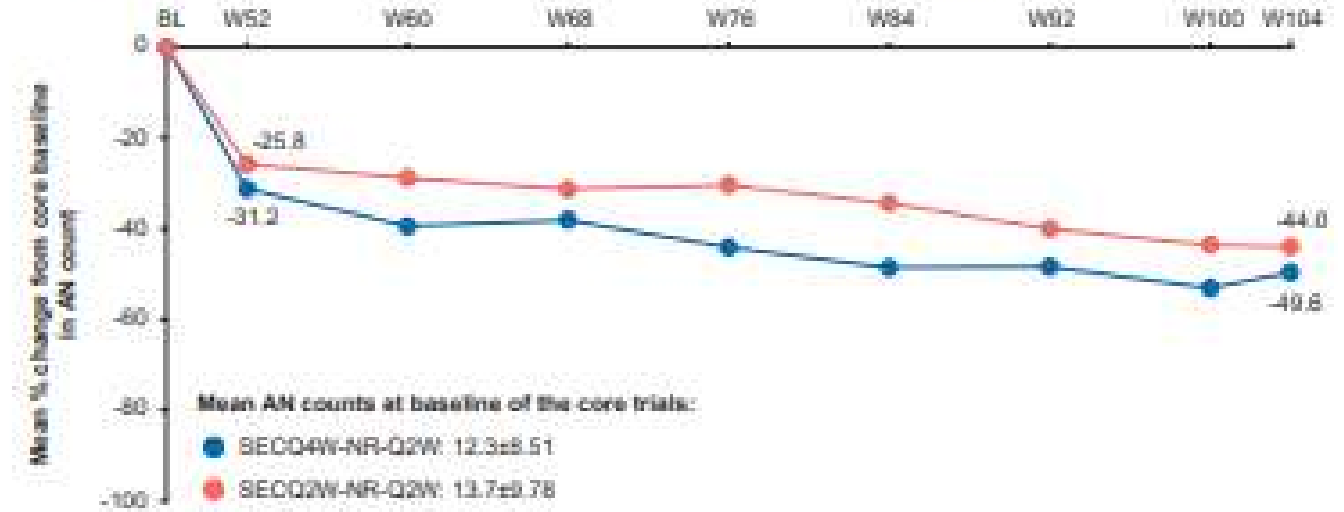
Afsaneh Alavi,<sup>1</sup> Aysha Badat,<sup>2</sup> Falk G. Bechara,<sup>3</sup> Evangelos J. Giamarellos-Bourboulis,<sup>4</sup> Alice B. Gottlieb,<sup>5</sup> Haley B. Naik,<sup>6</sup> Axel P. Villani,<sup>7</sup> Amita Bansal,<sup>8</sup> Francesca Gasperoni,<sup>8</sup> Ryan Sullivan,<sup>9</sup> Ziad Reguia<sup>10</sup>

Figure 2. Proportion of patients achieving HiSCR (A), skin pain response/NRS30 (B), and DLQI response (C) at week 52 and week 104



HiSCR at week 52 did not equal 0% due to the difference between how week 52 HiSCR-NR were identified (using the weighted average of HiSCR components at baseline and screening of the core trials) and how HiSCR over time was calculated (see supplementary methods of Kimball et al. 2024 for additional details)  
DLQI, Dermatology Life Quality Index; HiSCR, Hidradenitis Suppurativa Clinical Response; NRS, Numerical rating scale.

Figure 3. Mean percentage change from baseline of the core trials from week 52 to week 104



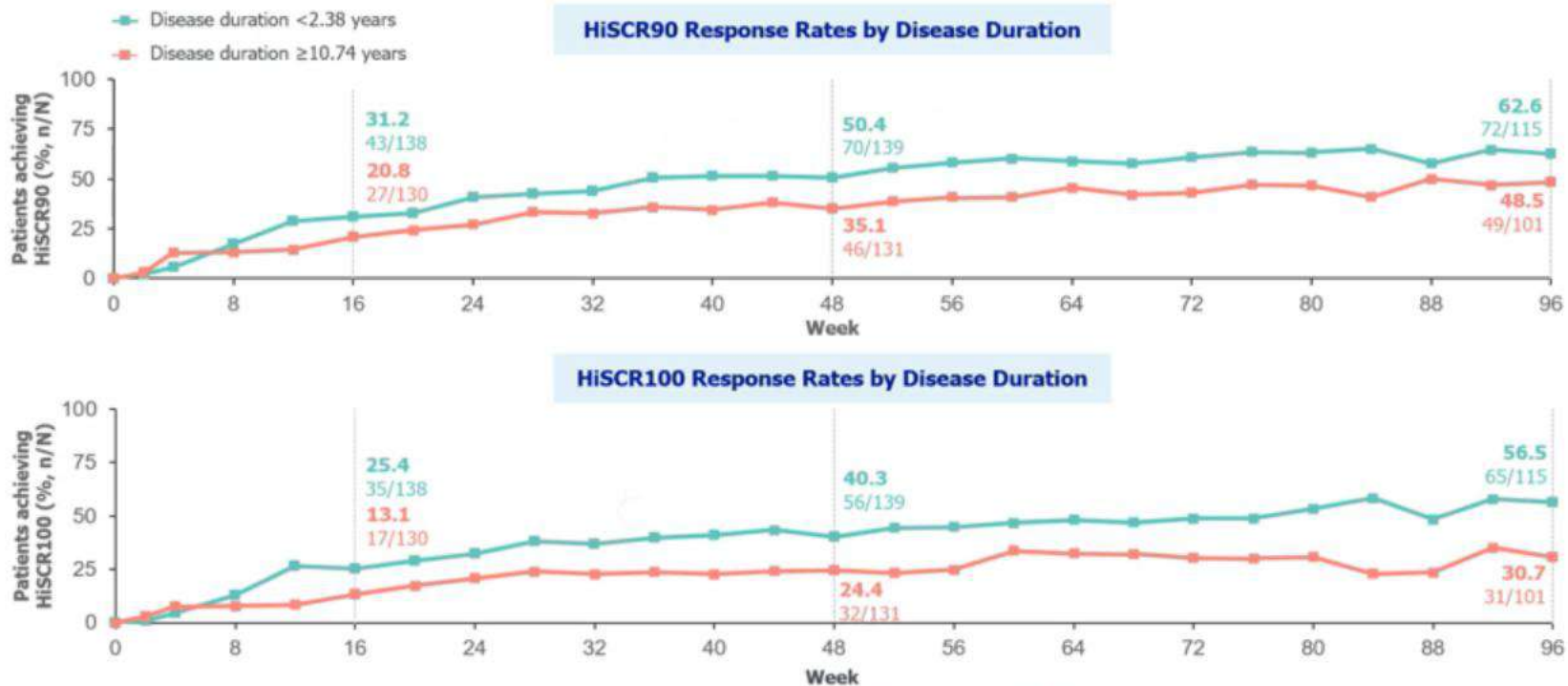
N	BL	W52	W60	W68	W76	W84	W92	W100	W104
SECQ4W-NR-Q2W	158	139	141	142	135	133	127	109	114
SECQ2W-NR-Q2W	151	128	134	137	134	129	122	112	113

AN, abscess and inflammatory nodule; BL, baseline of the core trial; W, week.

# Bimekizumab efficacy by disease duration in moderate to severe hidradenitis suppurativa: 2-year phase 3 results from BE HEARD EXT

Raj Chovatiya,<sup>1,2</sup> Seth Forman,<sup>3</sup> Afsaneh Alavi,<sup>4,5</sup> Hessel H. van der Zee,<sup>5,6</sup> Takuya Miyagawa,<sup>7</sup> Melinda Gooderham,<sup>8,9</sup> Ingrid Pansar,<sup>10</sup> Robert Roller,<sup>11</sup> Asim Datye,<sup>12</sup> Christos C. Zouboulis<sup>5,13</sup>

## HiSCR90/100 Rates by Lowest and Highest Disease Duration Quartiles to Week 96 (OC)



• Achievement of HiSCR90/100 generally increased over time in both the lowest and highest disease duration quartiles.



## Clinical Pearl: HS medical management requires layered therapy

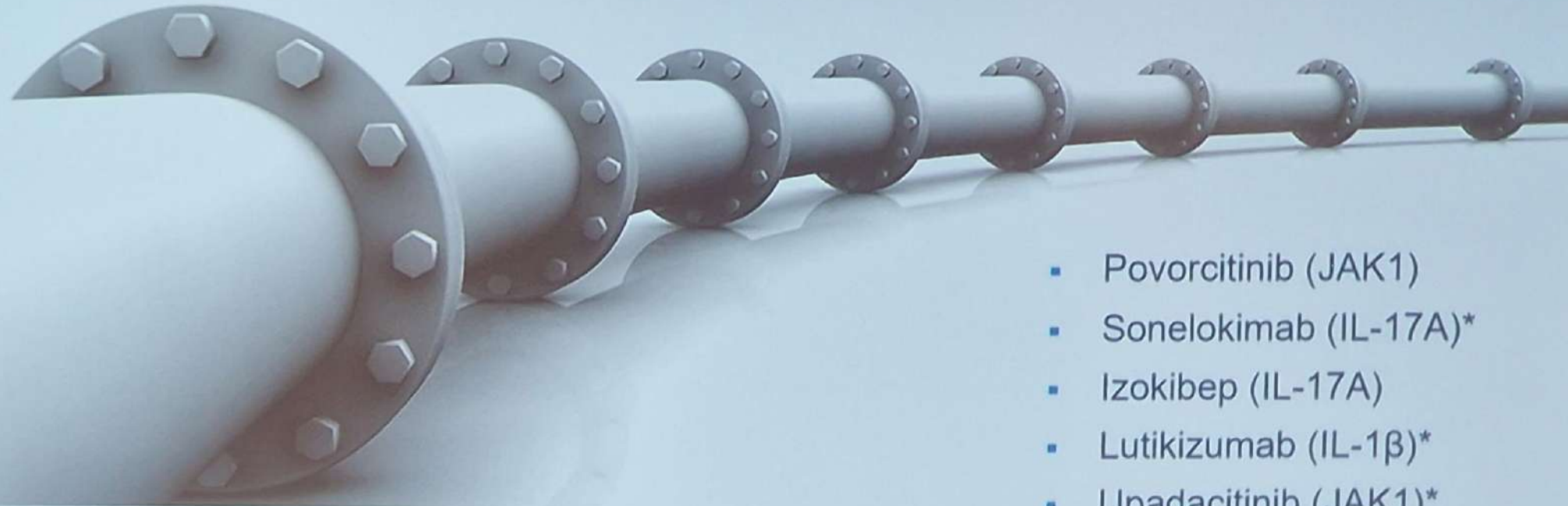
- Biologic + systemic antibiotics
- Biologic + hormonal therapy
- Biologic + biologic
- Biologic + JAK inhibitor





# NUEVAS MOLÉCULAS

Drugs to watch



- Povorcitinib (JAK1)
- Sonelokimab (IL-17A)\*
- Izokibep (IL-17A)
- Lutikizumab (IL-1 $\beta$ )\*
- Upadacitinib (JAK1)\*
- Remibrutinib (BTK)

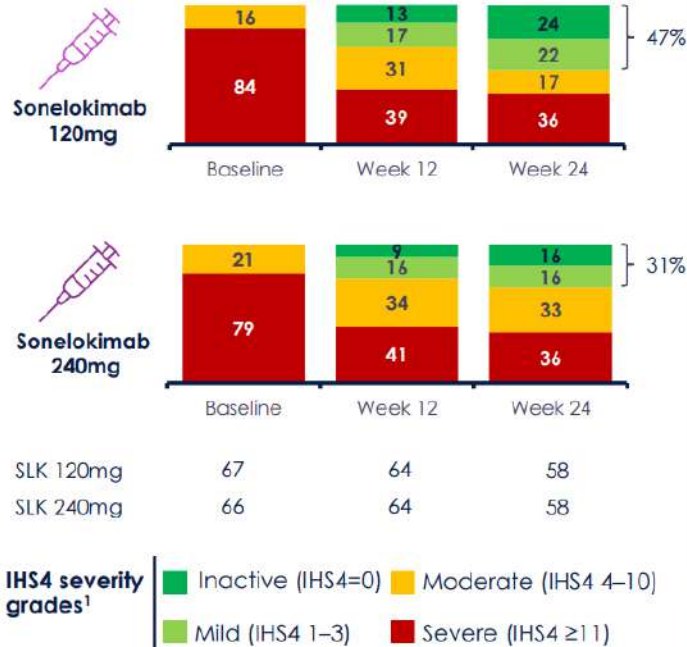
# SONELOKIMAB

A total of 47% of patients receiving sonelokimab 120mg achieved 'inactive or mild' disease by Week 24

## IHS4-100 responses and other IHS4 outcomes with the IL-17A- and IL-17F-inhibiting Nanobody® sonelokimab in patients with moderate-to-severe hidradenitis suppurativa (HS): Week 24 results from the Phase 2 MIRA trial

Christopher J. Sayed,<sup>1</sup> Brian Kirby,<sup>2</sup> John W. Frew,<sup>3,4</sup> Martina L. Porter,<sup>5</sup> John R. Ingram,<sup>6</sup> Errol Prens,<sup>7</sup> Alexandra P. Charow,<sup>8,9</sup> Melinda J. Gooderham,<sup>10</sup> Laura Savage,<sup>11</sup> Kristian Reich,<sup>12,13</sup> Falk G. Bechara<sup>14</sup>

<sup>1</sup>Department of Dermatology, School of Medicine, University of North Carolina, Chapel Hill, NC, USA; <sup>2</sup>Charles Department of Dermatology, St Vincent's University Hospital and Charles Institute of Dermatology, University College Dublin, Dublin, Ireland; <sup>3</sup>University of New South Wales, Sydney, Australia; <sup>4</sup>Laboratory of Translational Cutaneous Medicine, Ingham Institute for Applied Medical Research, Sydney, Australia; <sup>5</sup>Department of Dermatology, Harvard Medical School and Beth Israel Deaconess Medical Center, Boston, MA, USA; <sup>6</sup>Department of Dermatology, Division of Infection and Immunity, Cardiff University, Cardiff, UK; <sup>7</sup>Department of Dermatology, Erasmus University Medical Center, Rotterdam, The Netherlands; <sup>8</sup>Department of Dermatology, Brigham and Women's Hospital, Boston, MA, USA; <sup>9</sup>Harvard Medical School, Boston, MA, USA; <sup>10</sup>SKN Centre for Dermatology, Probita Medical Research and Queen's University, Peterborough, ON, Canada; <sup>11</sup>Leeds Centre for Dermatology, University of Leeds, Leeds, UK; <sup>12</sup>Mocul Lake Immunotherapeutics AG, Zug, Switzerland; <sup>13</sup>Translational Research in Inflammatory Skin Diseases, Institute for Health Services Research in Dermatology and Nursing, University Medical Center Hamburg-Eppendorf, Hamburg, Germany; <sup>14</sup>Department of Dermatology, Venerology and Allergology, International Centre for Hidradenitis Suppurativa/Acne Inversa (ICH), Ruhr University Bochum, Bochum, Germany

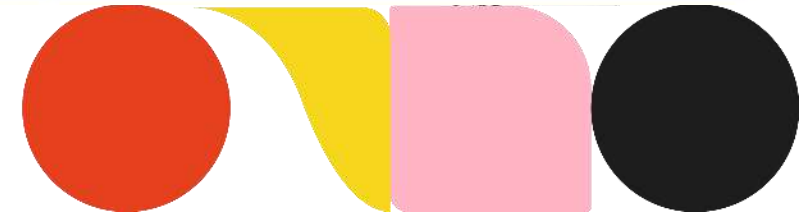


### Discussion

- The IL-17A- and IL-17F-inhibiting Nanobody sonelokimab demonstrated high levels of IHS4 response vs. placebo at Week 12, and improvements continued through Week 24
  - Improvements were consistent even in patients with the most severe HS at baseline
- IHS4 outcomes are consistent with the high levels of HiSCR 75 response,<sup>2</sup> and suggest efficacy across all three key inflammatory HS lesion types
- Sonelokimab was well tolerated, with no unexpected safety findings<sup>2</sup>
- The ongoing Phase 3 VELA-1 (NCT06411899), VELA-2 (NCT06411379), and VELA-TEEN (NCT06768671) trials will further examine IHS4 outcomes with sonelokimab 120mg in a larger cohort of patients with moderate-to-severe HS

### Conclusion

1 in 4 patients achieved IHS4-100, or 'inflammatory remission', after 24 weeks receiving sonelokimab 120mg

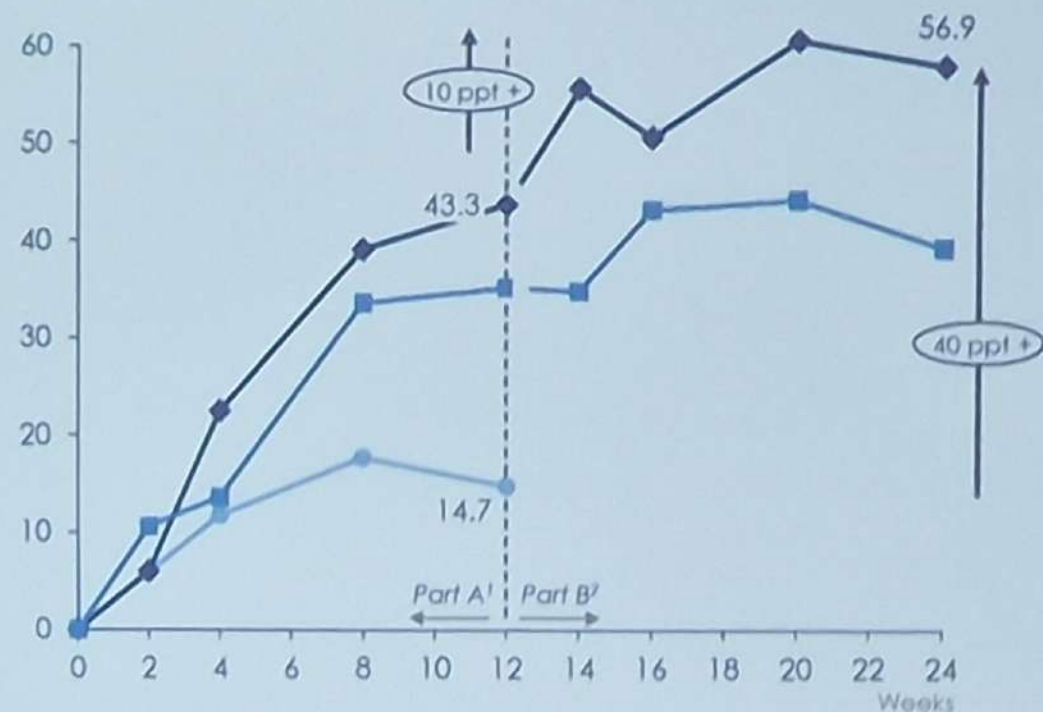


# Phase 2 Sonelokimab met primary endpoint HiSCR75 at Week 12

● PLC ● SLK 120mg ■ SLK 240mg

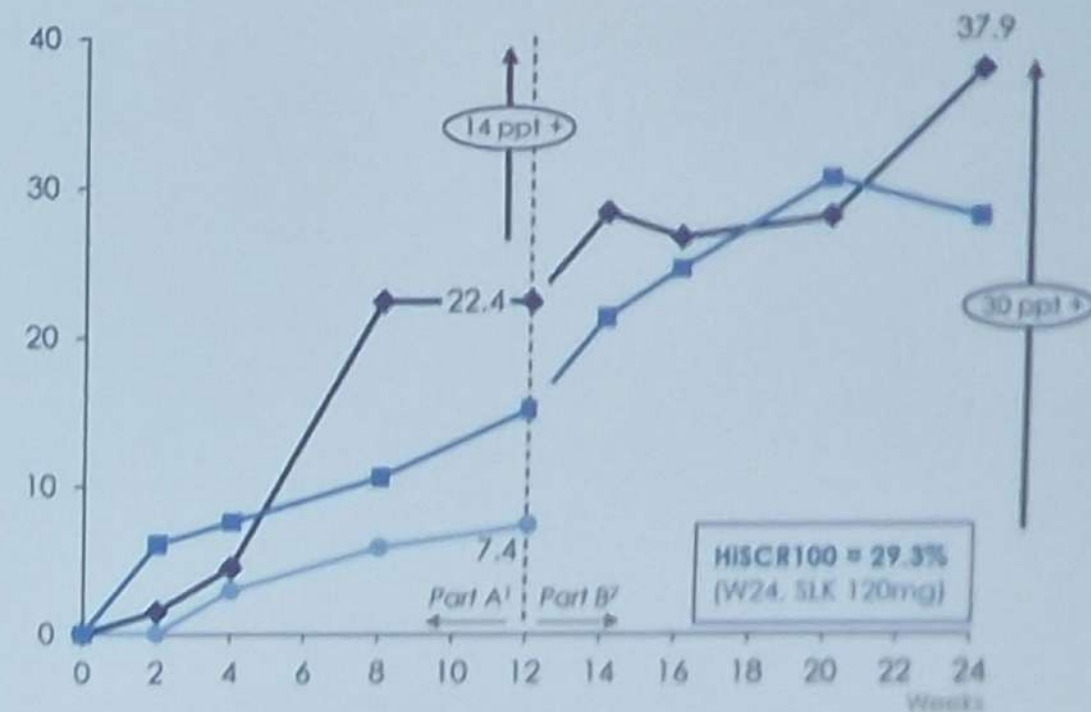
## HiSCR75 response (Primary endpoint)

Percent (%) pts reaching score



## HiSCR90 response

Percent (%) pts reaching score





# LUTIKIZUMAB

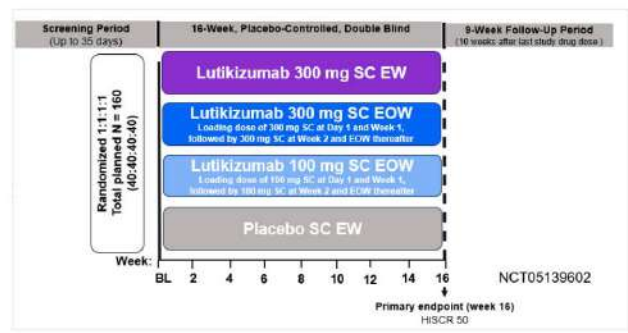
Poster # 63539

## Improvement in Draining Tunnels in Response to Lutikizumab Treatment in Adult Patients with Moderate-to-Severe Hidradenitis Suppurativa Who Have Failed Anti-TNF Therapy

Alexa B Kimball,<sup>1</sup> Lindsay Ackerman,<sup>2</sup> Hermenio Lima,<sup>3,4</sup> Brian Kirby,<sup>4,5</sup> Tianyu Zhan,<sup>6</sup> Amy Gamelli,<sup>6</sup> Konrad T Sawicki,<sup>6</sup> Mona Akbari,<sup>6</sup> David Williams,<sup>6</sup> Falk G Bechara<sup>7</sup>

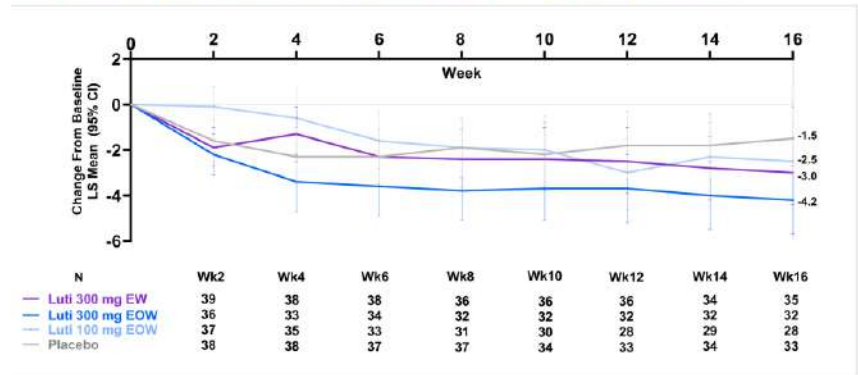
<sup>1</sup>Harvard Medical School and Clinical Laboratory for Epidemiology and Applied Research in Skin, Department of Dermatology, Beth Israel Deaconess Medical Center, Boston, MA, USA; <sup>2</sup>Medical Dermatology Specialists, Phoenix, AZ, USA; <sup>3</sup>LEADER Research Inc., Hamilton, Ontario, Canada; <sup>4</sup>McMaster University, Faculty of Health Sciences, Hamilton, Ontario, Canada; <sup>5</sup>Department of Dermatology, St Vincent's University Hospital; School of Medicine, University College Dublin; <sup>6</sup>Charles Institute of Dermatology, University College Dublin, Dublin, Ireland; <sup>7</sup>AbbVie Inc., North Chicago, Illinois, United States; <sup>8</sup>Department of Dermatology, Venereology and Allergy, International Centre for Hidradenitis Suppurativa/Acne Inversa (ICH), Ruhr-University Bochum, Bochum, Germany

### Study Design and Treatment: Phase 2, Multicenter, Randomized, Double-Blind, Placebo-Controlled Trial



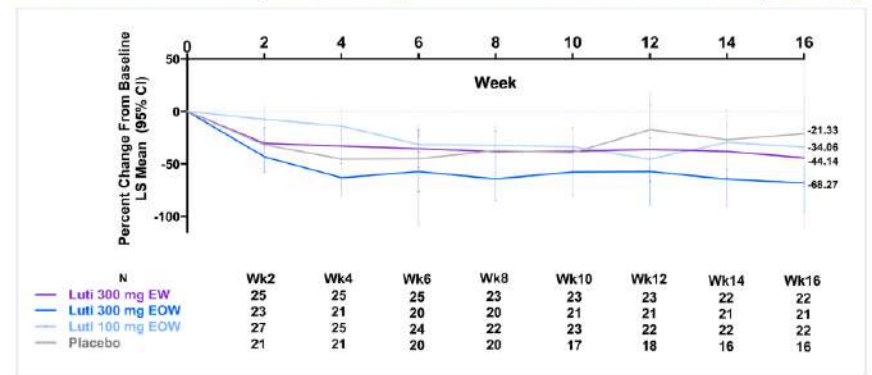
AN, abscess and inflammatory nodule; BL, baseline; EOW, every other week; EW, every week; HS, hidradenitis suppurativa; HSCR, hidradenitis suppurativa clinical response; NRS, numerical rating scale; SC, subcutaneous; TNF, tumor necrosis factor. The randomization was stratified by the worst Hurley Stage across all affected anatomic regions (< 3 or 3) at baseline. \*Achievement of HSCR 50 was defined as a ≥ 50% reduction in the total AN count with no increase in abscess count and no increase in draining fistula count relative to baseline. †NRS30 is defined as at least 30% reduction and at least 1-unit reduction from baseline in patient's global assessment of skin pain

### Change From Baseline in Draining Tunnel Count in Patients Receiving Lutikizumab Treatment vs Placebo (MMRM)

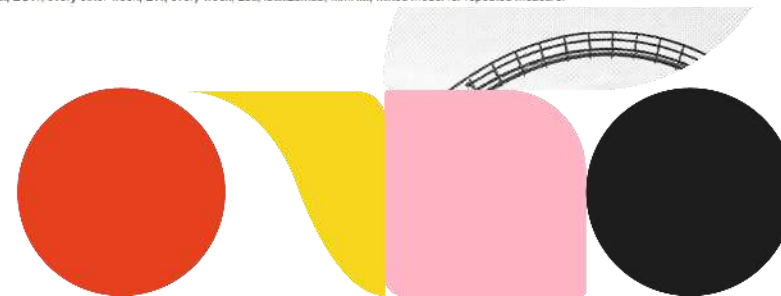


CI, confidence interval; EOW, every other week; EW, every week; Luti, lutikizumab; MMRM, mixed model for repeated measure.

### Percent Change From Baseline in Draining Tunnel Count in Patients Receiving Lutikizumab Treatment vs Placebo (MMRM)

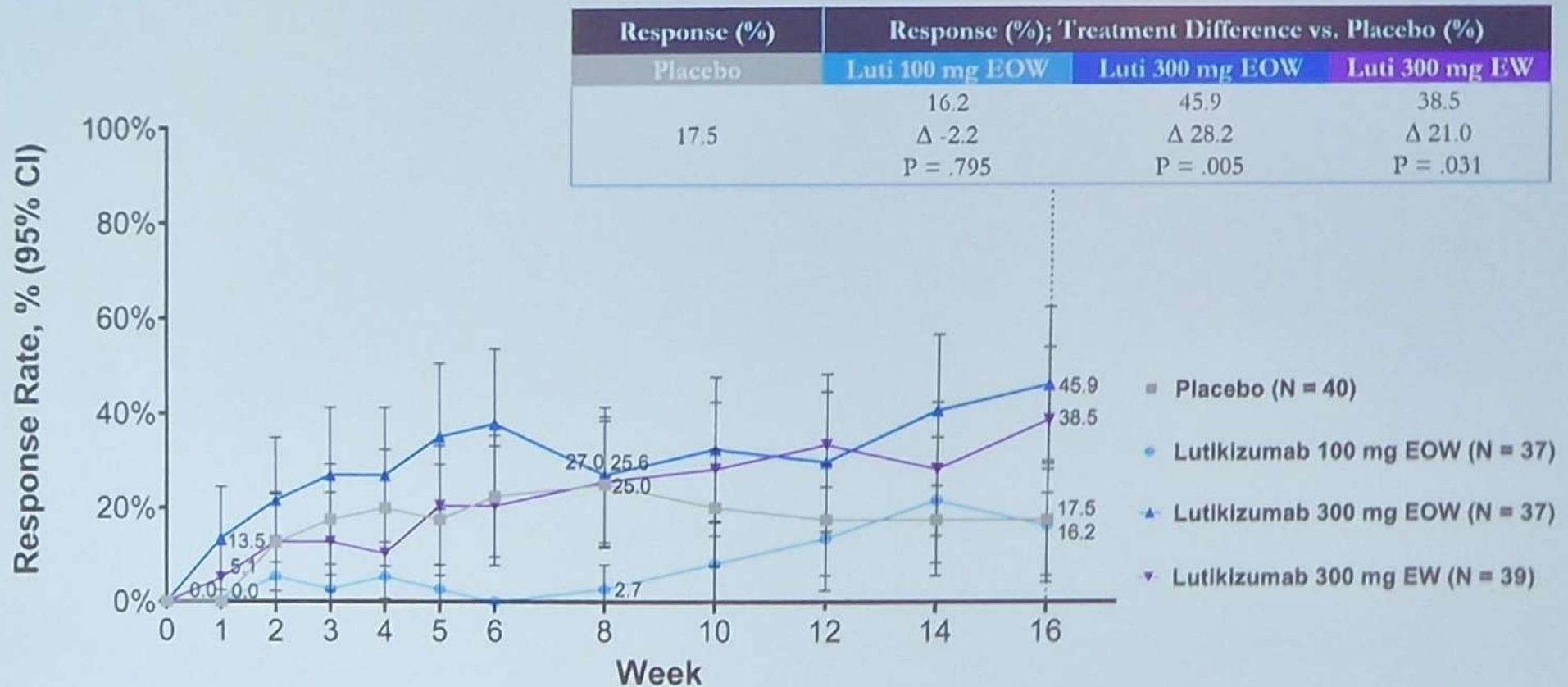


CI, confidence interval; EOW, every other week; EW, every week; Luti, lutikizumab; MMRM, mixed model for repeated measure.



# LUTIKIZUMAB

## HiSCR Responses to Lutikizumab (Phase 2)



# UPADACITINIB

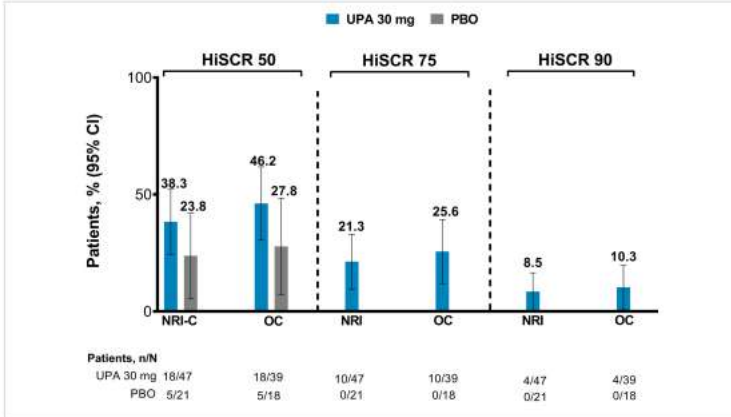
Poster # 64412

## Maintenance of Clinical Response to Upadacitinib Treatment in Adult Patients with Moderate to Severe Hidradenitis Suppurativa

Amit Garg,<sup>1</sup> So Yeon Paek,<sup>2</sup> Axel P. Villani,<sup>3</sup> Hermenio Lima,<sup>4,5</sup> Maria Cecilia Rivitti-Machado,<sup>6</sup> Tianyu Zhan,<sup>7</sup> Xiaohong Huang,<sup>7</sup> Beth Rycroft,<sup>7</sup> Heidi S. Camp,<sup>7</sup> Bethanee J. Schlosser,<sup>7</sup> Lindsay Ackerman<sup>8,9</sup>

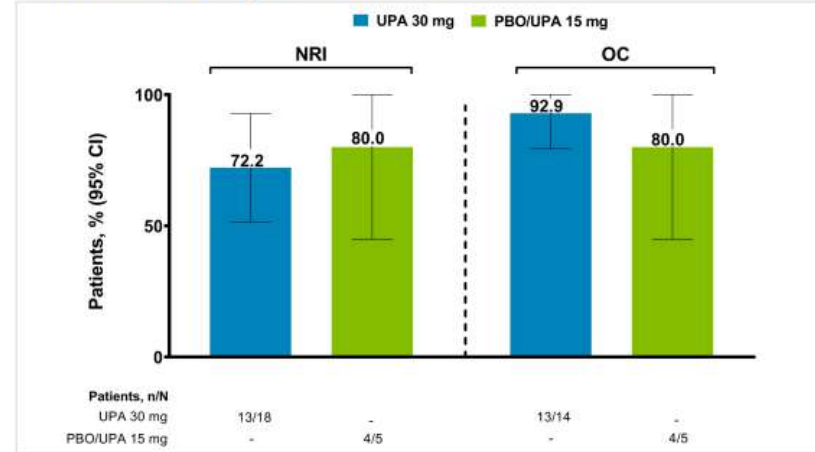
<sup>1</sup>Department of Dermatology, Northwell Health, New Hyde Park, NY, US; <sup>2</sup>Division of Dermatology, Baylor University Medical Center, Dallas, Texas; <sup>3</sup>Hôpital Edouard Herriot, Hospices Civils de Lyon, France; <sup>4</sup>LEADER Research Inc., Hamilton, Ontario, Canada; <sup>5</sup>McMaster University, Faculty of Health Sciences, Hamilton, Ontario, Canada; <sup>6</sup>Hospital das Clínicas da Faculdade de Medicina da Universidade de São Paulo, São Paulo, Brazil; <sup>7</sup>AbbVie Inc., North Chicago, IL, US; <sup>8</sup>Medical Dermatology Specialists, US Dermatology Partners, Phoenix, AZ, US; <sup>9</sup>University of Arizona College of Medicine, Phoenix, AZ, US

Achievement of HiSCR 50, HiSCR 75, HiSCR 90 at Week 12



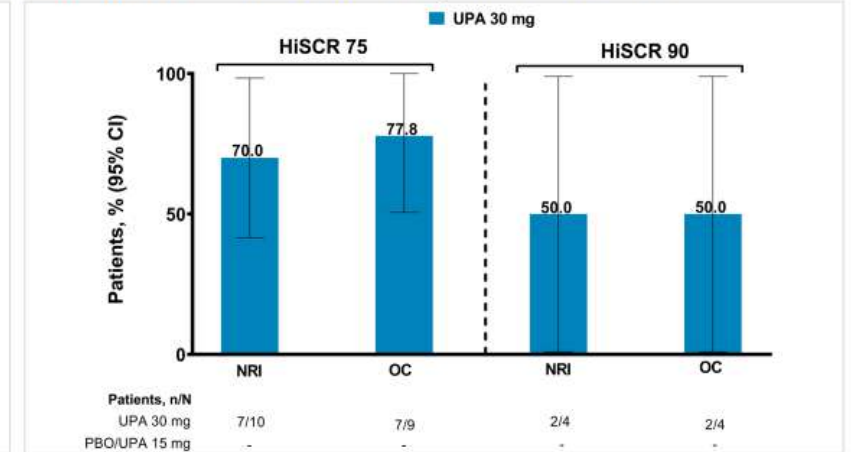
HiSCR 50/75/90 defined as  $\geq 50\%/75\%/90\%$  reduction from baseline in abscess and inflammatory nodule (AN) count with no increase in abscess or draining fistula count.  
CI, confidence interval; OC, observed cases; HiSCR, Hidradenitis Suppurativa Clinical Response; NRI, non-responder imputation; NRI-C, non-responder imputation incorporating multiple imputation to handle missing data due to COVID; PBO, placebo; UPA, upadacitinib.

Maintenance of HiSCR 50 at Week 40 Among Patients Who Achieved the Response at Week 12



HiSCR 50 is defined as  $\geq 50\%$  reduction from baseline in abscess and inflammatory nodule (AN) count with no increase in abscess or draining fistula count.  
CI, confidence interval; NRI, non-responder imputation; OC, observed cases; PBO, placebo; UPA, upadacitinib.

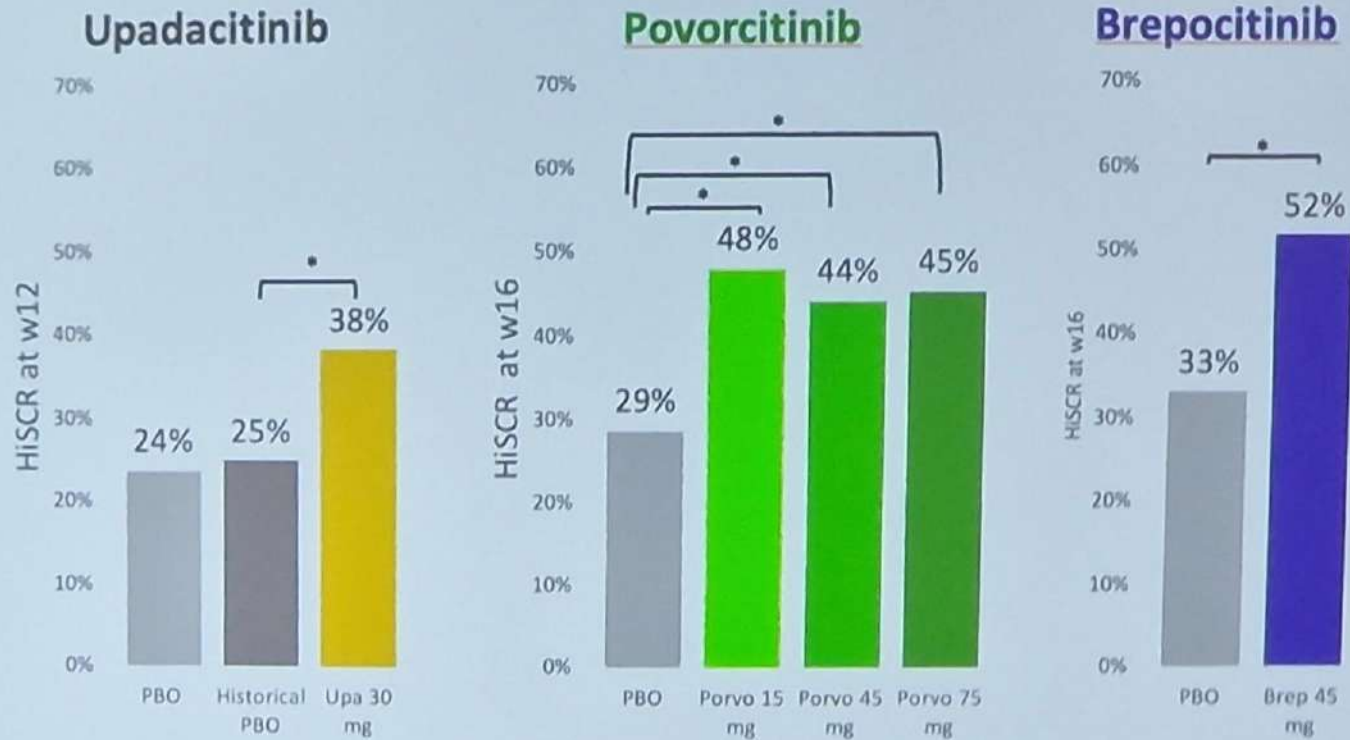
Maintenance of HiSCR 75 and HiSCR 90 at Week 40 Among Patients Who Achieved the Response at Week 12



HiSCR 75 is defined as  $\geq 75\%$  reduction from baseline in abscess and inflammatory nodule (AN) count with no increase in abscess or draining fistula count.  
HiSCR 90 is defined as  $\geq 90\%$  reduction from baseline in abscess and inflammatory nodule (AN) count with no increase in abscess or draining fistula count.  
CI, confidence interval; NRI, non-responder imputation; OC, observed cases; PBO, placebo; UPA, upadacitinib.



# Efficacy of JAK Inhibitors



Slide adapted from Lauren Orenstein

# Povorcitinib: HiSCR90 and HiSCR100



# Topical Ruxolitinib

- Topical ruxolitinib 1.5% cream BID field treatment
- Mean age = 35.2 y, 100% female, 100% White, 20% Hispanic
- 4/5 participants achieved HiSCR

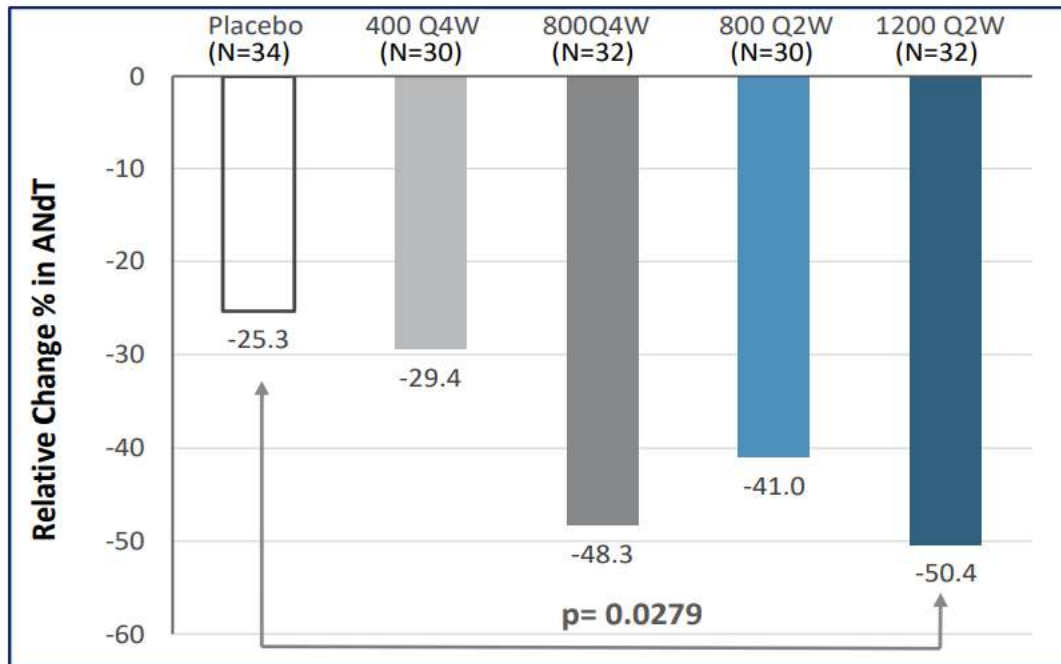




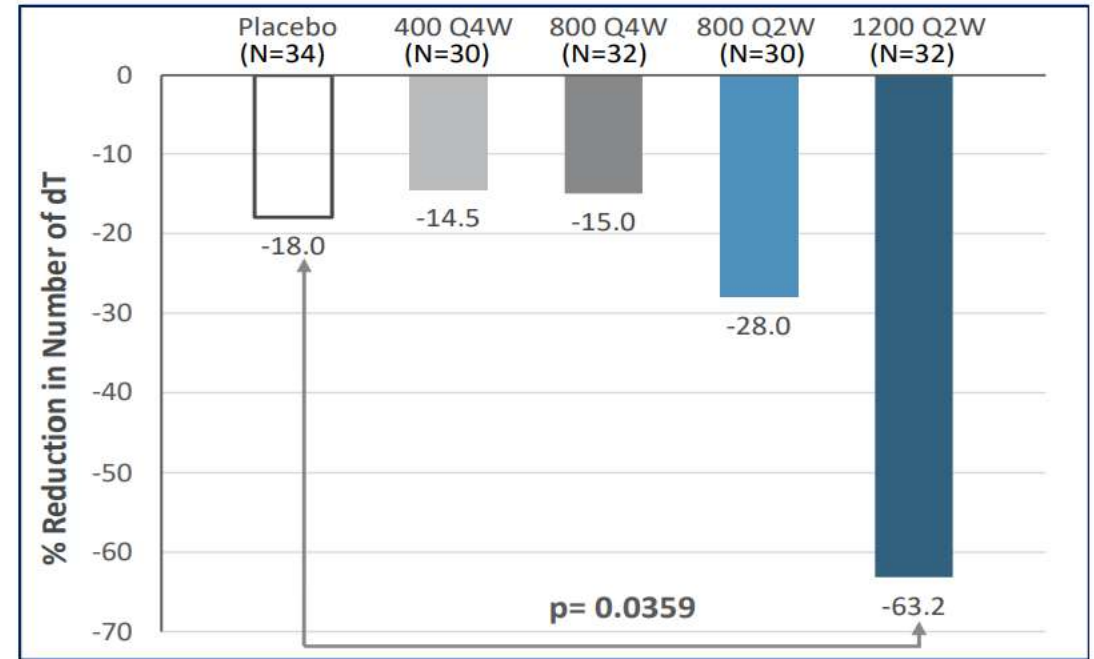
# Vilobelimab Post-hoc Efficacy in Hidradenitis Suppurativa using the Modified-HiSCR with Data from the Phase 2b SHINE Study

Evangelos J. Giamarellos-Bourboulis,<sup>1</sup> Christopher Sayed,<sup>2</sup> Camilla Chong,<sup>3</sup>  
Hoda Tawfik,<sup>3</sup> Bruce P. Burnett<sup>4</sup>

Relative Change in ANdT\* Count at Week 16 (LS Means)



Relative Change in dT\* Count at Week 16 (Means)



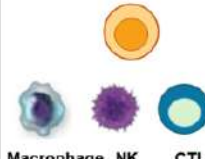




# NAV-240

## A First-in-Human Phase 1a Randomized, Double-Blind, Single-Ascending Dose Study of NAV-240, an anti-OX40L/TNF- $\alpha$ Bispecific Antibody, in Healthy Volunteers

Dana McClintock, MD<sup>1</sup>, Tim Mack, PhD<sup>1</sup>, Lara Pupim, MD<sup>1</sup>, Michael Tagen, PhD<sup>2</sup>, Junghyun Lilly Huh<sup>3</sup>, Chi Hye Park<sup>3</sup>, Gyong Sik Ha, PhD<sup>3</sup>, Naveen Daryani, PharmD<sup>1</sup>, William Bonificio, PhD<sup>1</sup>, Stephen Thomas, PhD<sup>1</sup>

<sup>1</sup>Navigator Medicines, Inc., Scotch Plains, NJ. <sup>2</sup>Verdient Science LLC, Denver, CO. <sup>3</sup>IMBiologics Corp, Republic of Korea

Figure 1. OX40L and TNF $\alpha$  signaling targets

Immune Cells	Th1  Macrophage NK CTL	T <sub>reg</sub>  CD4 & CD8 T cells	Tfh  B cell $\rightarrow$ Auto-antibody	Th17  Neutrophil	Th2  Mast Cell Eosinophil
TNF $\alpha$	+++++	+	+	+	+
OX40L	+++	+++	+++	+++	+++

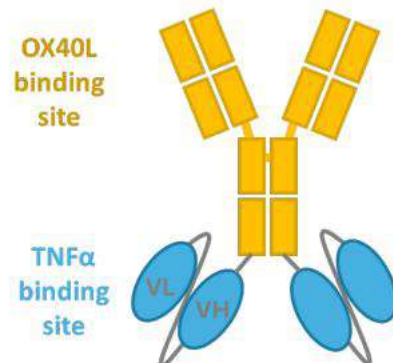
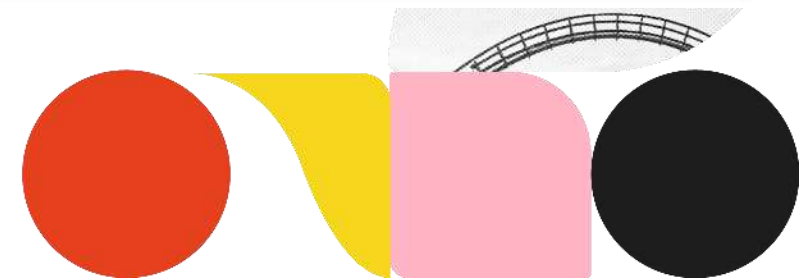


Table 1. Summary of Treatment-emergent Adverse Events

	Statistic	Placebo (n=10)	0.1 mg/kg (n=6)	0.3 mg/kg (n=6)	1 mg/kg (n=6)	3 mg/kg (n=6)	10 mg/kg (n=6)
TEAEs	E	5	2	0	2	0	2
Subjects with $\geq 1$ TEAE	n (%)	3 (30.0)	2 (33.3)	0	2 (33.3)	0	1 (16.7)
Drug-related <sup>1</sup> TEAEs	E	2	1	0	0	0	0
Severe <sup>2</sup> TEAEs	E	2	0	0	0	0	0
Serious TEAEs	E	0	0	0	0	0	0
Discontinuation due to TEAE	n (%)	0	0	0	0	0	0
Deaths due to TEAE	E	0	0	0	0	0	0



# SEVERE HIDRADENITIS SUPPURATIVA

TOPICAL  
CLINDAMYCIN

Don't be  
this guy





AAD **ANNUAL MEETING 2025**

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7 - 11  
MARZO  
ORLANDO

highlights



Una iniciativa de:



ACADEMIA ESPAÑOLA  
DE DERMATOLOGÍA  
Y VENEREOLÓGIA



FUNDACIÓN  
AE DV  
PIEL SANA  
ACADEMIA ESPAÑOLA  
DE DERMATOLOGÍA  
Y VENEREOLÓGIA

Con el patrocinio de:



UCB  
ACADEMIA  
DE DERMATOLOGÍA  
Y VENEREOLÓGIA