

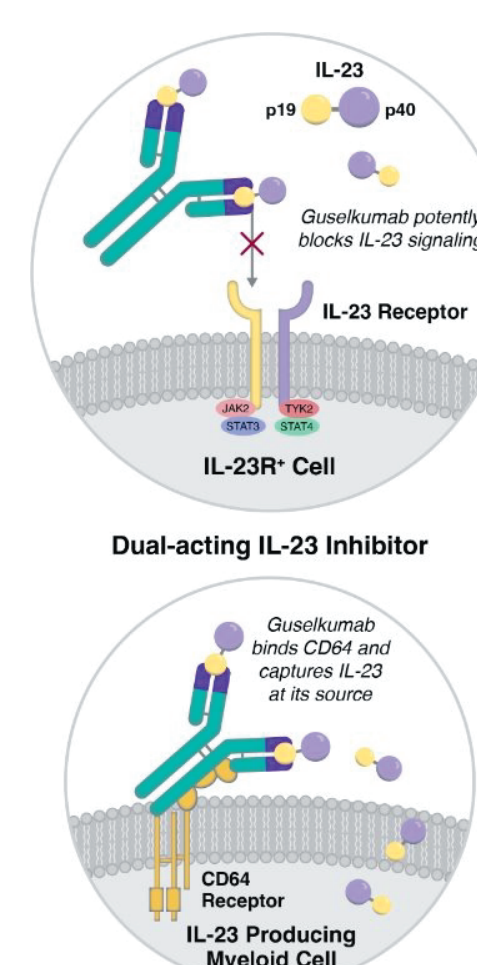
# Corticosteroid sparing effects of treatment with guselkumab in patients with moderately to severely active Crohn's disease: Phase 3 GALAXI 2/3 results through week 48

Julian Panés,<sup>1</sup> Tadaku Hisamatsu,<sup>2</sup> Alessandro Armuzzi,<sup>3</sup> Natalie A. Terry,<sup>4</sup> Leonardo Salese,<sup>5</sup> Rian Van Rampelbergh,<sup>6</sup> Jacqueline Yee,<sup>7</sup> Kitty YY Wan,<sup>8</sup> Zijiang Yang,<sup>9</sup> Scott Pin,<sup>10</sup> Bruce E. Sands,<sup>11</sup> David T. Rubin<sup>12</sup>

<sup>1</sup>Hospital Clínic de Barcelona, IDIBAPS, CIBERehd, Barcelona, Spain; <sup>2</sup>Department of Gastroenterology and Hepatology, Kyorin University, Tokyo, Japan; <sup>3</sup>IBD Center, IRCCS Humanitas Research Hospital, Rozzano, Milan, Italy; <sup>4</sup>Johnson & Johnson, Spring House, PA, USA; <sup>5</sup>Johnson & Johnson, Raritan, NJ, USA; <sup>6</sup>Johnson & Johnson, Basel, Switzerland; <sup>7</sup>Dr. Henry D Janowitz Division of Gastroenterology, Icahn School of Medicine at Mount Sinai, New York, NY, USA; <sup>8</sup>University of Chicago School of Medicine Inflammatory Bowel Disease Center, Chicago, IL, USA

## Background

- Achieving and maintaining corticosteroid (CS)-free remission is a treatment goal for Crohn's disease (CD)
- Guselkumab is a dual-acting IL-23p19 subunit inhibitor that binds to IL-23 and CD64, a receptor on cells that produce IL-23
- GALAXI 2 & GALAXI 3 are identically-designed, 48-week, randomized, double-blind, placebo-controlled and active-comparator (head-to-head) treat-through trials assessing the efficacy and safety of guselkumab in participants with moderately to severely active CD<sup>1-3</sup>
  - Co-primary efficacy endpoints were met in both studies for both guselkumab dose regimens vs placebo
  - Both guselkumab regimens also demonstrated superiority to ustekinumab across all endoscopic-based endpoints (including endoscopic remission and deep remission) at Week 48 in prespecified, multiplicity-controlled analyses based on pooled data from GALAXI 2 & 3



## Objective

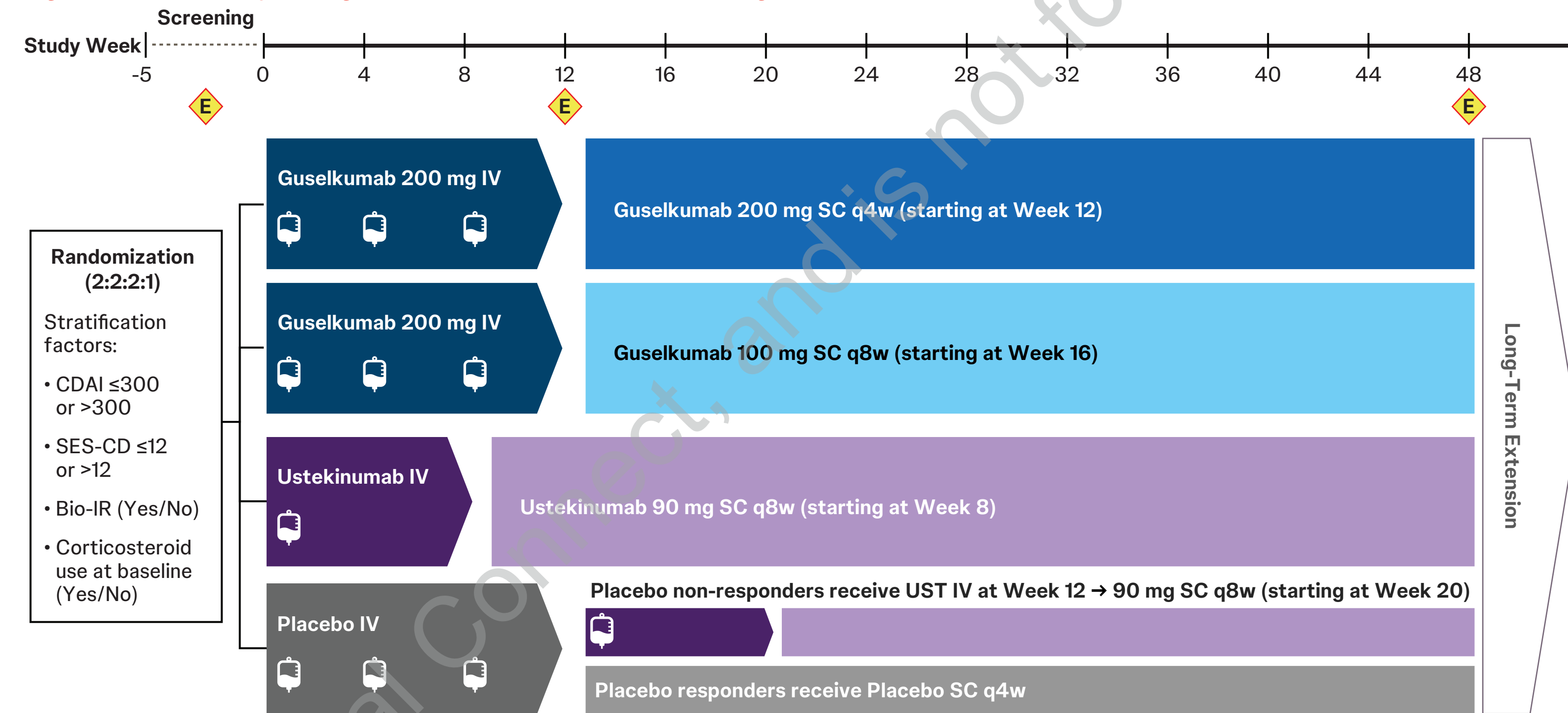
To evaluate the CS-sparing effects of treatment with guselkumab vs ustekinumab from the pooled GALAXI 2 and GALAXI 3 studies through Week 48

## Methods

- Participants with moderately to severely active CD (based on CDAI and SES-CD scoring) and inadequate response or intolerance to oral CS, azathioprine, 6-mercaptopurine, methotrexate, or to biologic (Bio-IR) therapy were eligible
- Subpopulation analyses:
  - Bio-IR: participants with a history of inadequate response or intolerance to biologic therapy
  - Bio-naïve: participants without a history of exposure to biologic therapy
- Participants receiving oral CS upon entry (up to 40 mg/day of prednisone-equivalent dose) were required to begin tapering their daily CS dose at Week 12, unless not medically feasible
- Outcomes evaluated

- Primary analysis set
  - GALAXI 2: N=508
  - GALAXI 3: N=513

Figure 1. Identically-designed, Double-blind, Treat-through studies: GALAXI 2 & 3



Outcome	Definition
90-day CS-free endoscopic response	≥50% improvement from baseline in SES-CD score OR SES-CD score ≤2 for ≥90 days prior to Week 48
90-day CS-free endoscopic remission (global definition)	SES-CD score ≤4 and a ≥2-point reduction from baseline and no subscore greater than 1 in any individual component and not receiving CS for ≥90 days prior to Week 48
90-day CS-free clinical remission	CDAI score <150 and not receiving CS for ≥90 days prior to Week 48
90-day CS-free clinical remission at Week 48 + endoscopic response at Week 48	CDAI score <150 and a ≥50% improvement from baseline in SES-CD score or SEC-CD Score ≤2 and not receiving CS for ≥90 days prior to Week 48
90-day CS-free deep remission	Achieving both clinical remission AND endoscopic remission and not receiving CS for ≥90 days prior to Week 48

CDAI=Crohn's Disease Activity Index; Deep Remission=clinical remission at Week 48 + endoscopic remission at Week 48; SES-CD=Simple Endoscopic Score for Crohn's Disease.

- CS-free analyses were not multiplicity controlled

## Results

### Pooled GALAXI 2 & 3

Table 1. Baseline demographics and disease characteristics

	Guselkumab				Total
	Placebo	200 mg IV q4w → 100 mg SC q8w	200 mg IV q4w → 200 mg SC q4w	Ustekinumab	
Primary analysis set, N	148	286	296	291	1021
Participant age (years), mean (SD)	34.8 (12.15)	36.0 (12.24)	36.9 (13.27)	37.4 (13.20)	36.5 (12.82)
Men, n (%)	88 (59.5%)	154 (53.8%)	178 (60.1%)	168 (57.7%)	588 (57.6%)
Crohn's disease duration (years), mean (SD)	7.2 (7.5)	7.1 (6.7)	7.1 (7.2)	7.3 (7.5)	7.2 (7.2)
CDAI score, mean (SD)	293.4 (52.7)	296.3 (54.3)	295.9 (52.7)	293.1 (52.0)	294.8 (52.9)
SES-CD score, mean (SD)	13.3 (7.6)	13.2 (7.4)	12.5 (7.2)	12.9 (7.0)	12.9 (7.3)
Endoscopic disease severity (SES-CD score), n (%)					
Moderate (7-16)	77 (52.0%)	164 (57.3%)	147 (49.7%)	159 (54.6%)	547 (53.6%)
Severe (>16)	43 (29.1%)	81 (28.3%)	79 (26.7%)	75 (25.8%)	278 (27.2%)
Involved GI areas by central reader, n (%)					
Ileum only	31 (20.9%)	59 (20.6%)	80 (27.0%)	55 (18.9%)	225 (22.0%)
Colon only	62 (41.9%)	113 (39.5%)	112 (37.8%)	116 (39.9%)	403 (39.5%)
Ileum and Colon	55 (37.2%)	114 (39.9%)	104 (35.1%)	120 (41.2%)	393 (38.5%)
Biomarkers					
CRP >3 (mg/L), n (%)	96 (64.9%)	208 (72.7%)	210 (70.9%)	202 (69.4%)	716 (70.1%)
Fecal calprotectin >250 (µg/g), n (%)	111 (75.5%)	235 (83.0%)	234 (79.6%)	229 (80.6%)	809 (80.3%)

CDAI=Crohn's Disease Activity Index; CRP=C-reactive protein; GI=gastrointestinal; IV=intravenous; SC=subcutaneous; SD=standard deviation; SES=Simple Endoscopic Score for Crohn's Disease.

Table 2. Baseline CD medication history

	Guselkumab				Total
	Placebo	200 mg IV q4w → 100 mg SC q8w	200 mg IV q4w → 200 mg SC q4w	Ustekinumab	
Primary analysis set, N	148	286	296	291	1021
No history of inadequate response/intolerance to biologic therapy, n (%)	70 (47.3%)	133 (46.5%)	149 (50.3%)	135 (46.4%)	487 (47.7%)
Biologic naïve	61 (41.2%)	116 (40.6%)	128 (43.2%)	121 (41.6%)	426 (41.7%)
Biologic experienced, but no documented nonresponse/intolerance	9 (6.1%)	17 (5.9%)	21 (7.1%)	14 (4.8%)	61 (6.0%)
History of inadequate response/intolerance to biologic therapy, n (%)	78 (52.7%)	153 (53.5%)	147 (49.7%)	156 (53.6%)	534 (52.3%)
At least one anti-TNF	76 (97.4%)	149 (97.4%)	143 (97.3%)	147 (94.2%)	515 (96.4%)
Two or more anti-TNFs	23 (29.5%)	31 (20.3%)	31 (21.1%)	46 (29.5%)	131 (24.5%)
Vedolizumab	13 (16.7%)	25 (16.3%)	18 (12.2%)	31 (19.9%)	87 (16.3%)
Participants with ≥1 Crohn's disease medication at baseline, n (%)	96 (64.9%)	207 (72.4%)	217 (73.3%)	210 (72.2%)	730 (71.5%)
6-MP/AZA/MTX	40 (27.0%)	87 (30.4%)	97 (32.8%)	83 (28.5%)	307 (30.1%)
Oral corticosteroids	51 (34.5%)	109 (38.1%)	106 (35.8%)	109 (37.5%)	375 (36.7%)

Primary nonresponse, secondary nonresponse, or intolerance; 6-MP=6-mercaptopurine; AZA=azathioprine; IV=intravenous; MTX=methotrexate; SC=subcutaneous; TNF=tumor necrosis factor.

Figure 2. 90-day CS-free outcomes at Week 48 in all participants

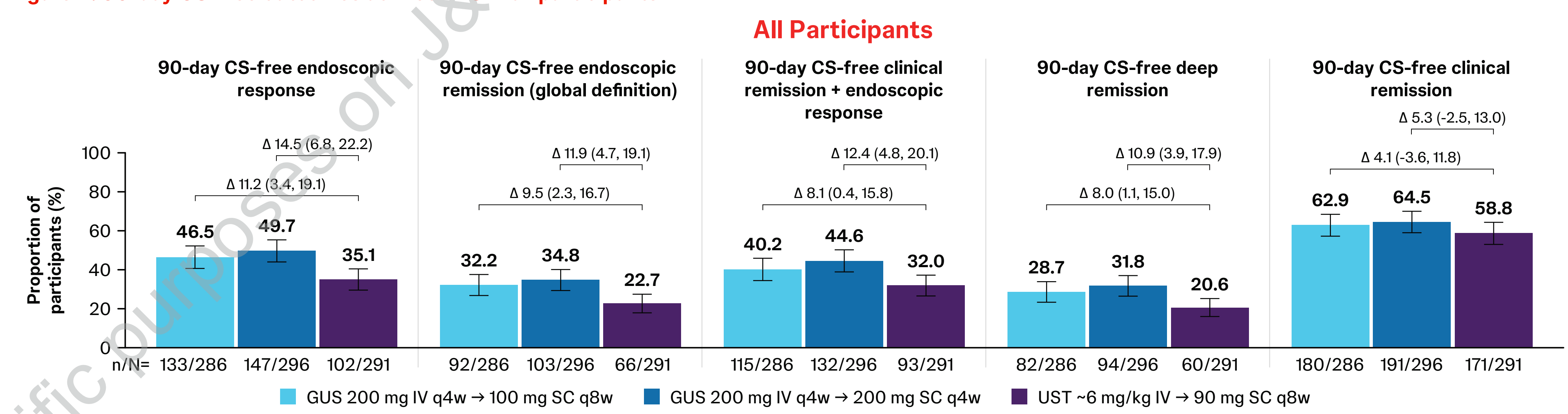


Figure 3. 90-day CS-free outcomes at Week 48 in Bio-naïve and Bio-IR participants

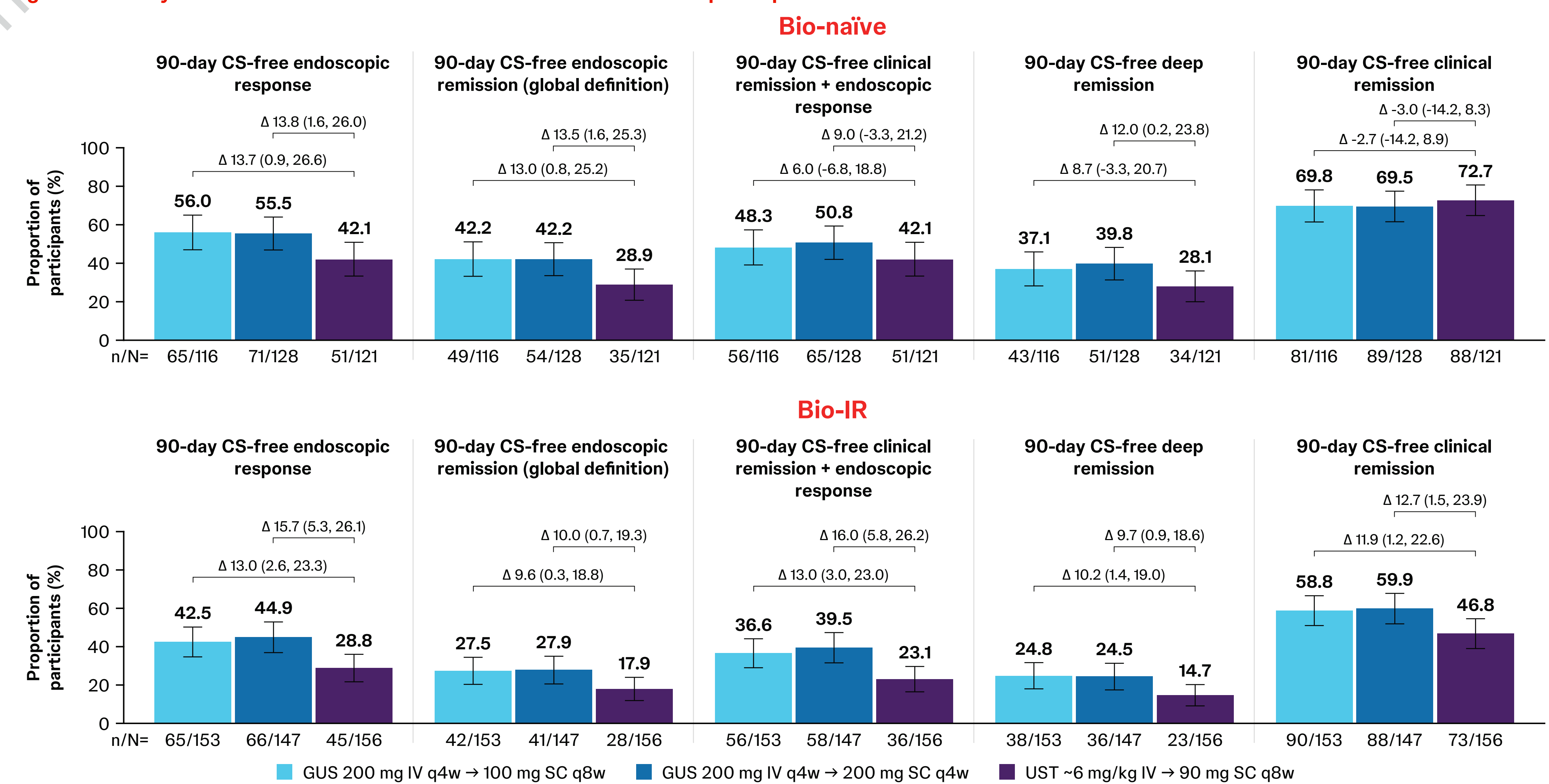
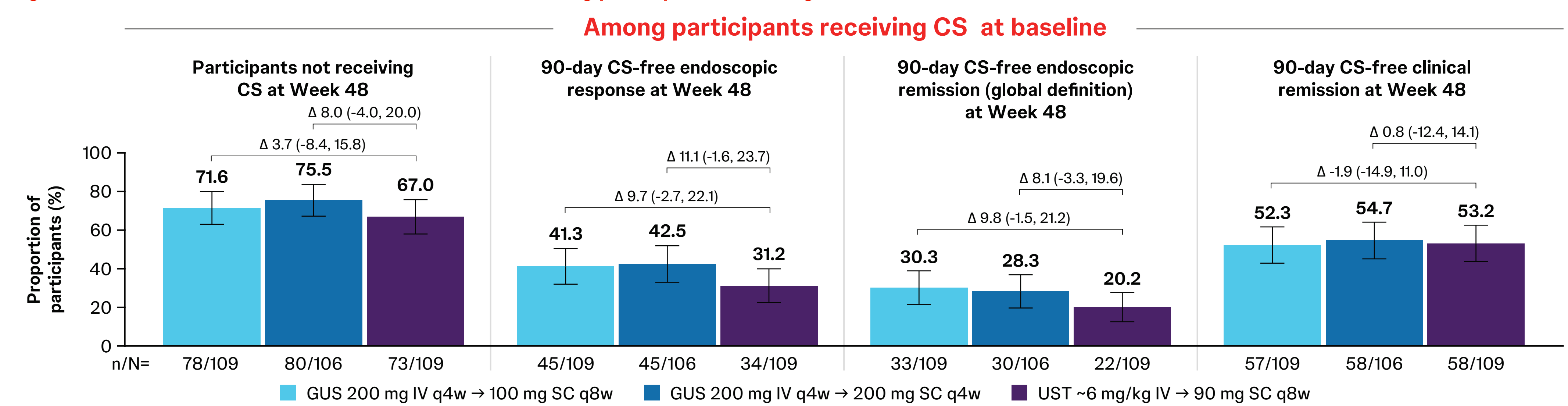


Figure 4. Corticosteroid-free outcomes at Week 48 among participants receiving oral corticosteroid at baseline



The adjusted treatment difference (Δ) and the CIs were based on the common risk difference by use of Mantel-Haenszel stratum weights and the Sato variance estimator. Participants who had a CD-related surgery, a prohibited change in concomitant CD medication, or discontinued study agent due to lack of efficacy, an adverse event of worsening CD or Week 20/24 non-response, or discontinued study agent for any other reason than COVID-19 related reasons or regional crisis prior to the analysis timepoint were considered not to have met the endpoint criteria. Participants who had discontinued study agent due to COVID-19 related reasons (excluding COVID-19 infection) or regional crisis had their observed data used, if available, to determine responder and non-responder status at Week 48. Missing data imputation: After accounting for missing data, participants who were missing CDAI score at Week 48 were considered not having achieved the endpoint at Week 48. CD=Crohn's disease; CDAI=Crohn's Disease Activity Index; CS=corticosteroid; GUS=guselkumab; IV=intravenous; q4w/q8w=every 4 or 8 weeks; SC=subcutaneous; SES-CD=Simple Endoscopic Score for Crohn's Disease; UST=ustekinumab.

## Key Takeaways

In CD, greater proportions of guselkumab-treated participants achieved 90-day corticosteroid-free efficacy outcomes through Week 48 vs ustekinumab in the overall population

90-day corticosteroid-free efficacy outcomes through Week 48 were greater in guselkumab-treated participants vs ustekinumab regardless of prior biologic exposure status

Among participants receiving corticosteroids at baseline, greater proportions of guselkumab-treated participants were corticosteroid-free at Week 48 vs ustekinumab