

**Supplementary Table 1.** Characteristics of eosinophilic inflammation in left colonic biopsies.

IBD <sup>†</sup> patients with left colonic biopsies at diagnosis, N	142
Number of eosinophils per HPF <sup>**</sup> (mean $\pm$ SD <sup>‡</sup> )	53.9 $\pm$ 28.7
Eosinophil-count categories, N (%)	
Less than 50/HPF	72(51)
50 to 100/HPF	49 (35)
Greater than 100/HPF	20(14)
Eosinophil predominance categories, N (%)	
Neutrophil-predominant inflammation	49(35)
Mixed	68(48)
Eosinophil-predominant inflammation	25(17)
Eosinophil inflammatory activity categories, N (%)	
No eosinophilic activity	44(31)
Focal eosinophilic activity	66(46)
Eosinophilic cryptitis	32(23)

IBD histologic severity, N (%)	
Mild colitis	38(27)
Moderate colitis	67(47)
Severe colitis	37(26)

\*Inflammatory bowel disease, \*\*High power field, ‡Standard deviation

**Supplementary Table 2.** Eosinophil count per IBD type, severity and clinical outcomes.

	N (%)	Number of eosinophils +/- SD*	P value
IBD type			0.7
Crohn's disease	19(13)	51.4 ± 31.3	
Ulcerative colitis	119(84)	54 ± 28.2	
Indeterminate colitis	4(3)	65.3 ± 33	
IBD severity			0.13
Mild	38(27)	48.3 ± 24.8	
Moderate	67(47)	52.9 ± 29.3	
Severe	37(26)	61.4 ± 30.2	

Flares			0.3
0	83(59)	51.5 ± 29.5	
1	58(41)	56.6 ± 27	
Hospitalization(s)			0.3
0	106(76)	55 ± 29	
1	22(16)	47 ± 22	
2	6(4)	62 ± 32	
3	4(3)	31 ± 28	
4	2(1)	75 ± 35	
Surgery			0.06
0	134(96)	54 ± 28	
1	4(3)	68 ± 24	
2	0		
3	2(1)	10.5 ± 5	
Fistula(e) or abscess(es)			0.5
0	132(95)	54.5 ± 28.5	
1	6(4)	50 ± 29.4	
2	1(1)	22	

\*Standard deviation

**Supplementary table 3 (A and B).** IBD type, severity and outcomes per type of inflammation.

**A:** Neutrophil predominant vs Mixed inflammation vs Eosinophil predominant

	Neutrophil predominant N (%)	Mixed inflamm ation N (%)	Eosinophil predominant N (%)	P-value
IBD type				0.4
Crohn's disease	6(12)	9(13)	4(16)	
Ulcerative colitis	43(88)	57(84)	19(76)	
Indeterminate colitis	0	2(3)	2(8)	
IBD severity				.09
Mild	10(20)	16(24)	12(48)	
Moderate	25(51)	32(47)	10(40)	
Severe	14(29)	20(29)	3(12)	
Flares				0.04
0	22(45)	43(64)	18(72)	
1	27(55)	24(36)	7(28)	
Hospitalization(s)				0.2

0	32(65)	53(80)	21(84)	
1	11(22)	9(14)	2(8)	
2	3(6.5)	2(3)	1(4)	
3	3(6.5)	0(0)	1(4)	
4	0	2(3)	0(0)	
Surgery				0.3
0	44(92)	66(99)	24(96)	
1	2(4)	1(1)	1(4)	
2	0(0)	0	0(0)	
3	2(4)	0	0(0)	
Fistula(e) or abscess(es)				0.3
0	45(96)	64(96)	23(92)	
1	2(4)	3(4)	1(4)	
2	0(0)	0(0)	1(4)	

**B: Neutrophil predominant vs Mixed inflammation or eosinophil predominant.**

	Neutrophil predominant N (%)	Mixed inflammation or eosinophil predominant N (%)	P value
Flare(s)			.01

No flares	22(45)	61(66)	
One or more flares	27(55)	31(34)	
Hospitalization			.035
No hospitalization	32(65)	74(81)	
One or more hospitalization	17(35)	17(19)	
Surgery			.09
No surgery	44(92)	90(98)	
One or more surgery	4(8)	2(2)	

**Supplementary Table 4 (A and B).** Outcomes in ulcerative colitis patients per type of inflammation.

**A:** Neutrophil predominant vs Mixed inflammation vs Eosinophil predominant

	Neutrophil predominant N (%)	Mixed inflammation N (%)	Eosinophil predominant N (%)	P-value

Flares				0.1
0	19(44)	35(63)	13(68)	
1	24(56)	21(37)	6(32)	
Hospitalization(s)				.04
0	27(63)	46(84)	16(84)	
1	16(37)	9(16)	3(16)	

**B: Neutrophil predominant vs Mixed inflammation or eosinophil predominant.**

	Neutrophil predominant N (%)	Mixed inflammation or eosinophil predominant N (%)	P value
Flare(s)			.04
No flares	19(44)	48(64)	
One or more flares	24(56)	27(36)	
Hospitalization			.01
No hospitalization	27(63)	62(84)	
One or more hospitalization	16(37)	12(16)	

