

**Supplementary table 1 Total bile acids level of patients removed from the analysis**

<b>Reason</b>	<b>Number of patients</b>	<b>Mean total bile acid level in <math>\mu\text{mol/L}</math> (SD)</b>
Treatment with cyclosporine	12	3.45 (0.3)
Treatment with tacrolimus	11	47.51 (43.58)
Treatment with ursodesoxycholic acid	16	24.74 (13.8)
Treatment with cholestyramine	25	13.69 (10.43)
Primary sclerosing cholangitis	5	22.61 (15.81)
Organ transplantation	3	7.59 (2.67)

**Supplementary table 2 Clinical characteristics of patients with or without ileal involvement, active IBD and active smoking status<sup>1</sup>**

	Ileal versus colonic disease			Inactive IBD vs active IBD			Smoker versus nonsmoker		
	Ileal disease (n = 68)	Colonic disease (n = 92)	P	Non Inflammatory disease (n = 113)	inflammatory disease (n = 38)	P	Smokers (n = 32)	Nonsmokers (n = 128)	P
Age, mean (SD), y	42.9 (2.1)	43.7 (1.5)	0.729	45.2 (1.5)	40 (2.8)	0.087	45.7 (2.5)	42.8 (1.4)	0.350
Male	35 (51)	49 (53)	0.823	59 (52)	22 (58)	0.543	12 (38)	72 (56)	0.074
Female	33 (49)	43 (47)		54 (48)	16 (42)		20 (63)	56 (44)	
CD	67 (99)	21 (23)	5.99 E-26	58 (51)	25 (66)	0.221	26 (81)	62 (48)	0.003
UC	0 (0)	68 (74)		52 (46)	13 (34)		6 (19)	62 (48)	
IC	1 (1)	3 (3)		3 (3)	0 (0)		0 (0)	4 (3)	
CDAI, mean (SD)	95.1 (7.2)	88.4 (19.1)	0.689	94.4 (8.5)	91.7 (14)	0.867	103.8 (13.4)	89.4 (8.4)	0.368
MTWI, mean (SD)	0 (0)	4.2 (0.5)	Ns	3.3 (0.5)	8.3 (1.2)	0.0001	2.7 (1.1)	4.3 (0.5)	0.370
Disease phenotype									
L1	18 (26)	0 (0)	1.94 E-18	11 (10)	5 (13)	0.981	7 (22)	11 (9)	0.117
L2	2 (3)	21 (23)		16 (14)	7 (18)		3 (9)	20 (16)	
L3	48 (71)	0 (0)		32 (28)	13 (34)		16 (50)	32 (25)	
L4	12 (18)	0 (0)	0.00002	8 (7)	4 (11)	0.496	2 (6)	10 (8)	1.000
B1	44 (65)	11 (12)	0.119	36 (32)	15 (39)	0.794	17 (53)	38 (30)	0.866
B2	0 (0)	1 (1)		1 (1)	0 (0)		0 (0)	1 (1)	
B3	23 (34)	10 (11)		22 (19)	10 (26)		9 (28)	24 (19)	
P	16 (24)	5 (5)	0.0008	13 (12)	7 (18)	0.276	6 (19)	15 (12)	0.377
E1	0 (0)	6 (7)	Ns	6 (5)	0 (0)	0.417	0 (0)	6 (5)	0.999

E2	0 (0)	22 (24)	0.0001	16 (14)	5 (13)	0.077	2 (6)	20 (16)	2.15
E3	0 (0)	39 (42)		28 (25)	8 (21)		4 (13)	35 (27)	
Smokers	23 (34)	9 (10)		27 (24)	4 (11)		32 (100)	0 (0)	
Non smokers	45 (66)	83 (90)		86 (76)	34 (89)		0 (0)	128 (100)	
Extra intestinal manifestations									
Arthritis	18 (26)	28 (30)	0.583	31 (27)	13 (34)	0.426	10 (31)	36 (28)	0.827
Uveitis	2 (3)	3 (3)	0.909	4 (4)	1 (3)	0.787	1 (3)	4 (3)	1.000
Pyoderma gangrenosum	0 (0)	1 (1)	0.388	1 (1)	0 (0)	0.56	1 (3)	0 (0)	0.200
Erythema nodosum	2 (3)	3 (3)	0.909	2 (2)	3 (8)	0.067	1 (3)	4 (3)	1.000
Oral soars	6 (9)	5 (5)	0.402	6 (5)	5 (13)	0.107	1 (3)	10 (8)	0.695
Spondylarthritis	3 (4)	3 (3)	0.705	6 (5)	0 (0)	0.147	1 (3)	5 (4)	0.794
Colorectal cancer	0 (0)	0 (0)	ns	0 (0)	0 (0)	ns	0 (32)	0 (0)	ns
Colonic dysplasia	1 (1)	1 (1)	0.828	2 (2)	0 (0)	0.408	1 (3)	1 (1)	0.361
Lymphoma	0 (0)	0 (0)	ns	0 (0)	0 (0)	ns	0 (0)	0 (0)	ns
Osteoporosis	10 (15)	16 (17)	0.649	21 (19)	4 (11)	0.247	5 (16)	21 (16)	1.000
Anemia	12 (18)	13 (14)	0.544	12 (11)	13 (34)	0.0007	4 (13)	21 (16)	1.000
Thrombosis	1 (1)	4 (4)	0.301	3 (3)	2 (5)	0.437	2 (6)	3 (2)	0.261
Pulmonary embolism	1 (1)	1 (1)	0.828	2 (2)	0 (0)	0.408	2 (6)	0(0)	0.038
Biliary stones	4 (6)	3 (3)	0.422	3 (3)	3 (8)	0.152	2 (6)	5 (4)	0.627
Urinary stones	2 (3)	4 (4)	0.643	5 (4)	1 (3)	0.624	1 (3)	5 (4)	1.000
Malabsorption	7 (10)	2 (2)	0.027	7 (6)	1 (3)	0.396	1 (3)	8 (6)	0.688
Lab values									
CRP, mg/l (SD)	12.7 (2.3)	10.8 (2.2)	0.556	4.0 (0.2)	34.1 (4.8)	3.0E-20	10.1 (3.2)	11.9 (1.8)	0.658
Ferritin, ug/l	183.8	207.6	0.814	184.4 (61.9)	266.0 (97)	0.492	142.0	209.8 (59.9)	0.603

(SD)	(57.5)	(74.8)				(41.2)			
B12 vitamin, pmol/l (SD)	468.3 (106.8)	450.1 (78.1)	0.888	440.2 (68.5)	543 (166.9)	0.504	390.4 (105.6)	472.4 (73.8)	0.621
Alkaline phosphatase, U/l (SD)	77.1 (4.6)	77.4 (5)	0.962	75.7 (4.3)	80.7 (6.4)	0.540	67.6 (3.3)	79.6 (4.2)	0.180
Albumin, g/l (SD)	38 (0.8)	39.6 (0.8)	0.189	40.2 (0.6)	35.6 (1.3)	0.001	40.7 (1)	38.6 (0.7)	0.147
Medical therapies									
Oral 5-ASA	10 (15)	49 (53)	5.8 E-7	44 (39)	12 (32)	0.416	10 (31)	49 (38)	0.541
Topical 5-ASA	0 (0)	10 (11)	0.004	5 (4)	5 (13)	0.061	0 (0)	10 (8)	0.213
Sulfasalazine	2 (3)	2 (2)	0.759	4 (4)	0 (0)	0.239	2 (6)	2 (2)	0.178
Metronidazole	0 (0)	2 (2)	0.221	0 (0)	2 (5)	0.014	1 (3)	1 (1)	1.000
Ciprofloxacin	2 (3)	2 (2)	0.759	1 (1)	2 (5)	0.094	0 (0)	4 (3)	0.584
Clarithromycin	0 (0)	0 (0)	ns	0 (0)	0 (0)	ns	0 (0)	0 (0)	1.000
Azathioprine	25 (37)	33 (36)	0.905	42 (37)	13 (34)	0.743	12 (38)	46 (36)	1.000
6- Mercaptopurine	5 (7)	3 (3)	0.240	8 (7)	0 (0)	0.091	1 (3)	7 (5)	1.000
Remicade	10 (15)	7 (8)	0.149	13 (12)	4 (11)	0.869	4 (13)	13 (10)	0.749
Humira	2 (3)	1 (1)	0.392	2 (2)	1 (3)	0.742	2 (6)	1 (1)	0.102
Cimzia	3 (4)	0 (0)	0.041	3 (3)	0 (0)	0.31	2 (6)	1 (1)	0.102
Methotrexate	6 (9)	4 (4)	0.247	8 (7)	2 (5)	0.696	4 (13)	6 (5)	0.113
Budesonide	12 (18)	6 (7)	0.027	12 (11)	5 (13)	0.668	4 (13)	14 (11)	0.760
Systemic prednisone	13 (19)	25 (27)	0.236	25 (22)	13 (34)	0.137	3 (9)	35 (27)	0.036
Topical prednisone	0 (0)	0 (0)	ns	0 (0)	0 (0)	ns	0 (0)	0 (0)	Ns
Supplements									
Iron	5 (7)	14 (15)	0.128	13 (12)	5 (13)	0.785	2 (6)	17 (13)	0.368
Vitamin B12	18 (26)	5 (5)	0.0001	15 (13)	6 (16)	0.698	7 (22)	16 (13)	0.256

Folate	10 (15)	8 (9)	0.234	15 (13)	3 (8)	0.375	6 (19)	12 (9)	0.205
Multivitamin	3 (4)	3 (3)	0.705	4 (4)	2 (5)	0.638	1 (3)	5 (4)	1.000
Magnesium	5 (7)	3 (3)	0.240	7 (6)	1 (3)	0.396	2 (6)	6 (5)	0.660
Calcium	26 (38)	24 (26)	0.101	37 (33)	11 (29)	0.663	11 (34)	39 (30)	0.674
Vitamin D	24 (35)	18 (20)	0.025	28 (25)	13 (34)	0.258	9 (28)	33 (26)	0.823
Vitamin E	0 (0)	3 (3)	0.132	2 (2)	1 (3)	0.742	0 (0)	3 (2)	1.000
Potassium	0 (0)	2 (2)	0.221	1 (1)	1 (3)	0.415	0 (0)	2 (2)	1.000
Lactase	0 (0)	0 (0)	ns	0 (0)	0 (0)	ns	0 (0)	0 (0)	ns
Pancreatic enzymes	1 (1)	0 (0)	0.243	1 (1)	0 (0)	0.560	1 (3)	0 (0)	0.200
Fishoil	3 (4)	4 (4)	1.000	6 (5)	1 (3)	0.497	1 (3)	6 (5)	1.000
Enteric nutrition	0 (0)	1 (1)	0.388	0 (0)	1 (3)	0.083	0 (0)	1 (1)	1.000
Parenteric nutrition	0 (0)	1 (1)	0.388	0 (0)	1 (3)	0.083	0 (0)	1 (1)	1.000
Probiotics	1 (1)	1 (1)	0.828	2 (2)	0 (0)	0.408	0 (0)	2 (2)	1.000

Comparison of patient's clinical characteristics in 3 situations: ileal versus colonic disease, inflammatory versus non-

inflammatory disease and smokers versus non-smokers.<sup>1</sup> results expressed in number with percentage in parenthesis

otherwise stated. SD, standard deviation; CD, Crohn's disease; UC, ulcerative colitis; IC, indeterminate colitis; CDAI,

Crohn disease activity index; MTWI, modified Truelove & Witts index; CRP, C reactive protein; Montreal classification: L1,

ileal Crohn's disease; L2, colonic Crohn's disease; L3, ileocolonic Crohn's disease; L4, isolated upper gastrointestinal

Crohn's disease; B1, no stenosis and no fistula; B2, stenosing phenotype; B3, fistulating phenotype; P, perineal disease; E1,

proctitis of ulcerative colitis; E2, left colitis of ulcerative colitis; E3, pancolitis of ulcerative colitis.