

The guidelines for the treatment of severe psoriasis in adults

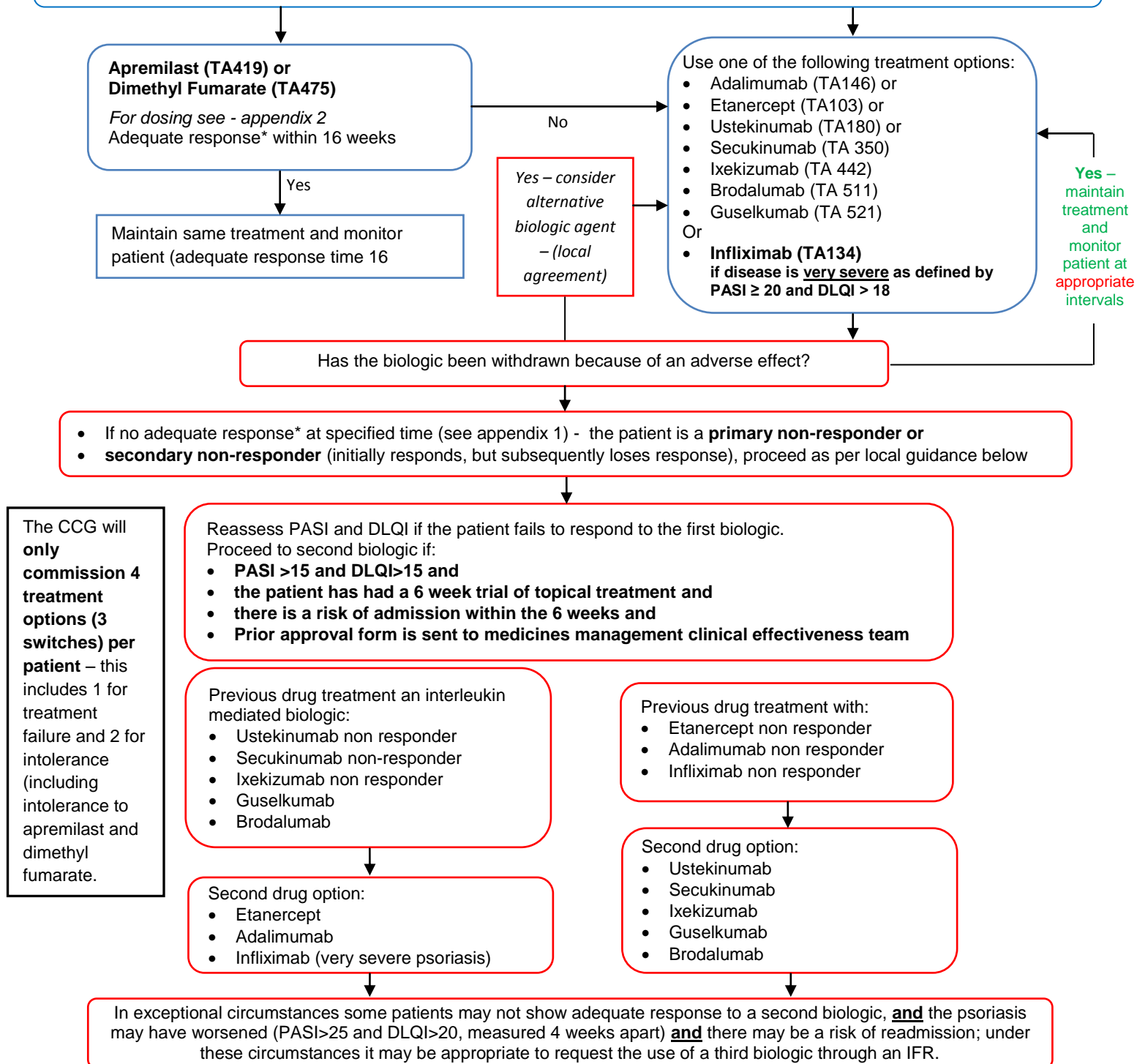
Relevant NICE documents:

Etanercept TA103
Adalimumab TA146
Infliximab TA 134
Brodalumab TA 511

Ustekinumab TA 180
Secukinumab TA 350
Apremilast TA 419
Guselkumab TA 521

Ixekizumab TA442
Management of psoriasis CG 151
Dimethyl Fumarate TA475

Severe Psoriasis: **PASI ≥ 10 and DLQI > 10 and failed previous systemic therapies or these treatments are CI or not tolerated** (e.g ciclosporin, methotrexate or PUVA (psoralen and long-wave ultraviolet radiation),



NICE approved treatment

Local variation to NICE

Adequate response defined as:

*a 75% reduction in the PASI score (PASI 75) from when treatment started **or**
a 50% reduction in the PASI score (PASI 50) and a 5-point reduction in the DLQI score from when treatment started.

Date reviewed: October 2018

Review due: September 2020

Appendix 1

	Dose	*Adequate response times (weeks)	Further information
Infliximab	5-mg/kg intravenous infusion over a 2-hour period followed by additional 5-mg/kg infusion doses at 2 and 6 weeks after the first infusion, then every 8 weeks thereafter	10	Infliximab is a chimeric human-murine IgG1 monoclonal antibody
Etanercept	Subcutaneous injection at a dose of 25 mg twice weekly. Alternatively, 50 mg given twice weekly may be used for up to 12 weeks followed, if necessary, by a dose of 25 mg twice weekly	12	Etanercept is a recombinant human tumour necrosis factor (TNF) receptor fusion protein that inhibits the activity of TNF
Adalimumab	Subcutaneous injection of an initial 80 mg dose, followed by 40 mg given subcutaneously every other week starting 1 week after the initial dose	16	Adalimumab is a recombinant human monoclonal antibody that binds specifically to tumour necrosis factor alpha (TNF- α)
Secukinumab	Subcutaneous injection at a dose 300 mg at weeks 0, 1, 2 and 3, followed by monthly maintenance dosing starting at week 4	12	Secukinumab is a high-affinity, fully human monoclonal antibody that binds to and neutralises interleukin-17A
Ixekizumab	By subcutaneous injection; 160 mg at week 0, followed by 80 mg every 2 weeks until week 12. After week 12, 80 mg every 4 weeks	12	Ixekizumab is an antibody that inhibits IL-17A (interleukin-17A, a pro-inflammatory cytokine)
Ustekinumab	The recommended dose of ustekinumab is 45 mg for people who weigh 100 kg or less, and 90 mg for people who weigh over 100 kg. An initial dose of ustekinumab is administered subcutaneously at week 0, followed by another dose at week 4, and then a further dose every 12 weeks	16	Ustekinumab is a fully human monoclonal antibody that targets interleukin-12 (IL-12) and IL-23
Brodalumab	The recommended dose is 210 mg administered by subcutaneous injection at weeks 0, 1 and 2, followed by 210 mg every 2 weeks	12	Brodalumab is a recombinant fully human monoclonal immunoglobulin IgG2 antibody that binds with high affinity to human IL-17RA and blocks the biological activities of the pro-inflammatory cytokines IL-17A, IL-17F, IL-17A/F heterodimer and IL-25
Guselkumab	The recommended dosage of guselkumab is 100 mg by subcutaneous injection at weeks 0 and 4, followed by a 100 mg maintenance dose every 8 weeks. Consideration should be given to stopping treatment in people whose disease has shown no response after 16 weeks of treatment	16	Guselkumab is a human IgG1 λ monoclonal antibody (mAb) that binds selectively to the interleukin 23 (IL-23) protein with high specificity and affinity

Appendix 2

Dose titration for Dimethyl Fumarate

To improve tolerability, it is recommended to begin treatment with a low initial dose with subsequent gradual increases. The maximum daily dose allowed is 720 mg (3 x 2 tablets of dimethyl fumarate 120 mg).

Week	Number of tablets			Total daily dose (mg) of dimethyl fumarate
	Morning	Midday	Evening	
Dimethyl fumarate 30 mg				
1	0	0	1	30
2	1	0	1	60
3	1	1	1	90
Dimethyl fumarate 120 mg				
4	0	0	1	120
5	1	0	1	240
6	1	1	1	360
7	1	1	2	480
8	2	1	2	600
9+	2	2	2	720

Dose titration for apremilast

- Day 1 - 10mg am
- Day 2 - 10mg am & pm
- Day 3 - 10mg am, 20mg pm
- Day 4 - 20mg am & pm
- Day 5 - 20mg am & 30mg pm
- Day 6 and thereafter - 30mg am & pm

NB: reduce dose 30mg od in severe renal impairment (CrCl <30ml/min, estimated using Cockcroft-Gault equation)

MHRA warning - apremilast

[MHRA](#), Jan 2017, have issued a warning regarding risk of suicidal thoughts and behavior associated with apremilast use.